

# HELMINTHOLOGICAL ABSTRACTS

*incorporating*  
BIBLIOGRAPHY OF HELMINTHOLOGY  
For the Year 1942.



IMPERIAL BUREAU OF AGRICULTURAL PARASITOLOGY  
(HELMINTHOLOGY)

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# HELMINTHOLOGICAL ABSTRACTS

INCORPORATING BIBLIOGRAPHY OF HELMINTHOLOGY  
FOR THE YEAR 1942.

Vol. XI, Part 5.

## 288—Almanaque del Ministerio de Agricultura. Republica Argentina.

- a. MENDY, R. M., 1942.—“La hidatidosis.” 17, 296–302.

## 289—American Journal of Diseases of Children.

- a. JONES, E. C., 1942.—“Incidence of pinworm infection in white and in negro hospitalized children.” 64 (5), 803–806.

## 290—American Journal of Hygiene.

- a. STOWENS, D., 1942.—“The effect of ultraviolet irradiation on *Trichinella spiralis*.” 36 (3), 264–268.  
b. CULBERTSON, J. T. & ROSE, H. M., 1942.—“Skin tests in schistosomiasis with antigen from *Pneumonocetes medioplexus*.” 36 (3), 311–315.

(290a) Irradiation with ultra-violet light has a deleterious effect on the viability and infectivity of larvae of *Trichinella spiralis*. After irradiation the adults do not readily establish themselves in the intestine and produce fewer and less active larvae. The results increase with increasing treatment. Stowens suggests that irradiation may affect the normal enzyme production of the worm, leading to decreased viability and, in the extreme, to death. P.A.C.

(290b) Culbertson & Rose have manufactured an enzyme from *Pneumonocetes medioplexus*, a lung-fluke of frogs, by extracting the dried parasites with carbolized saline. It will give a positive result to the intradermal test in patients suffering from *Schistosoma mansoni* infestation. A slight response was obtained from a patient who had been treated 2 years earlier but the test gave negative results with uninfected controls and with patients treated 3 or more years earlier. The antigen is active in very high dilution, is thermostable, water-soluble, but practically insoluble in alcohol or ether. P.A.C.

## 291—American Journal of Ophthalmology.

- a. TORRES ESTRADA, A., 1942.—“Ophthalmoscopic observation of microfilarias in the vitreous of patients infected with onchocerciasis.” 25 (12), 1445–1448.

(291a) The presence of the embryos of *Onchocerca volvulus* in the vitreous can be easily detected early by the use of the electric direct-image ophthalmoscope. They are more abundant in the vitreous than in the anterior chamber of the eye. R.T.L.

## 292—American Journal of Tropical Medicine.

- a. BONNE, C., 1942.—“Researches on sparganosis in the Netherlands East Indies.” 22 (6), 643–645.  
b. SCOTT, J. A., 1942.—“The natural pattern of dilution counts of helminth eggs.” 22 (6), 647–654.

(292a) Bonne summarizes published researches on sparganosis in the Netherlands East Indies. In man and monkeys it is due to *Diphyllbothrium ranarum* frequently found in frogs and less commonly in toads and develops into adults in dogs and even more frequently in cats. This sparganum develops in tadpoles experimentally, but natural infections have not been found. R.T.L.



(292b) Scott, discussing the analysis of data from helminthological surveys, points out that when data obtained by means of dilution counts from a normal population is plotted, an L- or J-shaped curve is obtained. He advocates the plotting of such data on a logarithmic scale and shows that if the mean is very high, a normal curve results, but if the mean is low, the number of cases falling below the lower counting limit is appreciable and part of the lower portion of the normal curve is lost, with consequent biasing of the mean in an upward direction. The area of the missing portion can be determined either by extrapolation from the known portion or by information derived from flotation examinations. Statistical constants can be derived which are valid for dealing with the upper portion of the curve and can provide material for such additional analyses and comparisons as it might be desired to make. D.F.

### 293—American Journal of Veterinary Research.

- a. PORTER, D. A., 1942.—“Incidence of gastrointestinal nematodes of cattle in the southeastern United States.” 3 (8), 304-308.
- b. WHITLOCK, J. H., 1942.—“Field test of various anthelmintics used for the treatment of haemonchosis.” 3 (9), 386-391.
- c. PORTER, D. A. & CAUTHEN, G. E., 1942.—“Experiments on the life history of the cattle lungworm, *Dictyocaulus viviparus*.” 3 (9), 395-400.
- d. OLSEN, O. W. & FENSTERMACHER, R., 1942.—“Parasites of moose in northern Minnesota.” 3 (9), 403-408.

(293a) From his studies on 84 cattle ranging in age from 1 to 18 months, Porter records 15 species of nematodes and gives data on their incidence and on the range in number of each parasite. *Cooperia punctata* was found to be the most prevalent species, occurring in 91% of the cattle examined. D.O.M.

(293b) Whitlock concludes, from extensive field trials on sheep in Kansas, that a simple copper sulphate solution is satisfactory against chronic haemonchosis and that, by monthly treatment, it is useful as a preventive against outbreaks of the disease. In the case of acute haemonchosis with marked anaemia and pronounced symptoms of subcutaneous oedema the author states that copper sulphate should not be used and that phenothiazine is more likely to give good results. D.O.M.

(293c) The authors found by experimental infections that the development of *Dictyocaulus viviparus* is essentially similar to that of the sheep lungworm. The prepatent period varied from 21 to 30 days and the duration of an infection from 32 to 120 days. Re-infection was well established in a 4½-months old calf, but only slight re-infections of short duration could be obtained in older animals. The paper also includes observations on the effects of lungworms on the host. D.O.M.

(293d) Olsen and Fenstermacher list the 13 species of helminths so far recorded from moose. Their list includes 3 species which are recorded for the first time, namely, *Trichuris* sp., *Oesophagostomum venulosum*, and *Ascaris* sp. A key for field identification of parasites of moose is included. A.E.F.

### 294—American Midland Naturalist.

- a. WHITE, F. M. & CABLE, R. M., 1942.—“Studies on the morphology of *Cystidicola cristivomeri* sp. nov. (Nematoda: Thelaziidae) from the swim bladder of the lake trout, *Cristivomer namaycush* (Walbaum).” 28 (2), 416-423.

### 295—Anais da Academia Brasileira de Ciencias.

- a. CORDERO, E. H., 1942.—“La validez de *Halipegus dubius* Klein (Trematoda, fam. Hemiuridae).” 14 (2), 127-135.

(295a) Cordero concludes that *Halipegus dubius* Klein, 1905 is a valid species, and that *H. similis* Lutz, 1928 is a synonym of *H. dubius*. Cordero figures the species for the first time. A.E.F.

### 296—Anales de la Facultad de Medicina de Montevideo.

- \*a. JAUREGUY, M. A., 1942.—“Síndromos de infestación del quiste hidático.” 27, 904-939.

\* Titles so marked throughout this number have not been seen in the original.



## 297—Anales de la Facultad de Veterinaria. Montevideo.

- \*a. CASSAMAGNAGHI, A., 1942.—“Contribución al estudio de los parasitos del cerdo en el Uruguay.” 4, 153-156.

## 298—Anales del Instituto de Biología.

- a. CABALLERO Y C., E., 1942.—“Nemátodos de las aves de México. IX. Descripción de una nueva especie del genero *Oxyspirura* y consideraciones acerca de las especies Mexicanas ya conocidas.” 13 (2), 527-532.
- b. BRAVO H., M., 1942.—“Acerca de un nemátodo parásito de la iguana (*Ctenosaura acanthura* (Shaw)).” 13 (2), 533-537.
- c. CABALLERO Y C., E., 1942.—“Parasitosis intestinal por helmintos en los niños escolares de Izúcar de Matamoros y Acatlán de Osorio, del Estado de Puebla.” 13 (2), 579-582.
- d. CABALLERO Y C., E., 1942.—“Tremátodos de las ranas de la Ciénaga de Lerma, Estado de México. IV.” 13 (2), 635-640.
- e. CABALLERO Y C., E., 1942.—“Tremátodos de los murciélagos de México. III. Descripción de *Urotrema scabridum* Braun, 1900, y posición sistematica de las especies norteamericanas de este género.” 13 (2), 641-648.
- f. CABALLERO Y C., E., 1942.—“Descripción de la segunda especie de *Capillaria* encontrada en los murciélagos de América del Norte. III. (Nematoda: Trichuridae).” 13 (2), 649-654.

(298a) Caballero adds to the subgenus *Yorkeispirura* which contains 3 species, viz., *Oxyspirura* (Y.) *tanaisijchuki*, O. (Y.) *tsingchengensis* and O. (Y.) *masoni*, a new species O. (Y.) *octopapillata* n. sp. from *Polyborus cheriway* taken at Tecomatlán, Puebla, Mexico.

R.T.L.

(298b) *Cyrtosomum scelopori* Geddoelst, 1919 is described and figured from *Ctenosaura acanthura*.

R.T.L.

(298d) *Cephalogonimus americanus* Stafford, 1902 is described from *Rana pipiens* in Mexico, and *Haematoleechus illimis*, *H. parvitellarius* and *Gorgoderina attenuata* receive brief notices.

R.T.L.

(298e) From a study of *Urotrema scabridum* from Mexican bats it is concluded that the genus contains only 2 valid species, viz., *Urotrema scabridum* and *U. wardi*.

R.T.L.

(298f) Caballero describes *Capillaria martinezi* n. sp. from the stomach of a bat, *Natalus mexicanus*, in Mexico. It can be distinguished by the structure of the bursa in the male and by the position of the vulva, the nature of the vagina and the size of the eggs in the female.

P.A.C.

## 299—Annals of Internal Medicine.

- a. ANDREWS, J., 1942.—“Modern views on the treatment and prevention of hookworm disease.” 17 (6), 891-901.

## 300—Antiseptic. Madras.

- \*a. NAMBIAR, K. C., 1942.—“Filariasis.” 39 (7), 408-411.

## 301—Archives de l'Institut Pasteur d'Algérie.

- a. ALCAY, L., MARILL, F. G. & MUSSO, J. C., 1942.—“Le foyer de bilharziose urinaire de Saint-Aimé-de-la-Djidiouia (département d'Oran—Algérie).” 20 (1), 39-99.

(301a) Alcaï et al. give a very detailed account of investigations into Schistosomiasis haematobia at Saint-Aimé. There is a definite and circumscribed focus of infection which is likely to spread as a result of the movements of natives between villages. A new irrigation system was started in 1934 which provided favourable breeding places for the snail intermediaries. *Bulinus contortus*, *B. c. raymondi*, *B. c. brochii*, *B. c. truncatus*, *Physa acuta* and (?) *Hydrobia brondeli* were common in the area. Although 57 specimens of *Bulinus* were negative for cercariae, further examinations will be necessary before definite conclusions as to the intermediaries can be drawn. Possible control measures, including periodical emptying and refilling of the canals, are discussed at length.

A.E.F.



## 302—Archives de l'Institut Pasteur de Tunis.

- a. LAURENT, C., BARGE, P., BERGE, C., AUDOYE, H. & FAUCONNIER, J., 1942.—“Deux nouveaux cas d'infestation par la grande douve du foie (*Fasciola hepatica*).” 31 (1/2), 154-158.

## 303—Archives of Pathology.

- a. CHOMET, B., 1942.—“*Oxyuris vermicularis* infection of the wall of a fallopian tube.” 34 (4), 742-744.

## 304—Archivos Uruguayos de Medicina, Cirugía y Especialidades.

- a. FOSSATI, A., 1942.—“Contribución al estudio del crecimiento del quiste hidatídico del pulmón.” 21 (2), 205-209.  
 b. LASNIER, E. P. & CASSINELLI, J. F., 1942.—“Diagnostico del quiste hidatido pulmonar en la expectoración incluída.” 21 (5), 564-575.  
 c. ARDAO, H. A., 1942.—“La supuración peri vesicular en el quiste hidático del pulmón.” 21 (5), 577-594.  
 d. SOTO BLANCO, J., 1942.—“Supuración perihidatídica en un quiste hidatídico pulmonar.” 21 (6), 639-642. [Discussion pp. 642-644.]  
 e. LARGHERO YBARZ, P., 1942.—“Supuración peri-hidatídica con hidátide intacta. (A propósito del neumoqueste perivesicular y del diagnóstico del q.h. por el método de Lasnier).” 21 (6), 645-660. [Discussion p. 661.]  
 f. ARDAO, H. A., 1942.—“Hidatosis pulmonar secundaria. Un raro mecanismo de injerto.” 21 (6), 662-666. [Discussion pp. 666-667.]  
 g. CHIFFLET, A. & PEYRALLO, R., 1942.—“60 observaciones de equinocosis pulmonar.” 21 (6), 668-677.  
 h. LARGHERO YBARZ, P. & ARDAO, H. A., 1942.—“Hemorragias mortales fulminantes en el q.h. del pulmón.” 21 (6), 678-689. [Discussion pp. 690-694.]

## 305—Archivos Ve zolanos de Puericultura y Pediatría.

- \*a. CAMEJO TROCONIS, R., 1942.—“Caso de diverticulitis de origen probablemente ascaridiano.” 4, 717-721.

## 306—Army Veterinary Bulletin. Washington.

- a. McNELLIS, R., 1942.—“Fuadin in the treatment of verminous dermatitis in horses.” 36 (2), 93-95.

(306a) Experiments carried out by McNellis on horses and mules in the Philippines showed that Fouadin had little or no effect on verminous dermatitis (equine dhobie itch). The test also showed that a safe dose of the drug for equines should not exceed a total of 1,200 c.c. administered intramuscularly, and not exceed 100 c.c. in any one day. D.O.M.

## 307—Arquivos da Assistência a Psicopatas do Estado de São Paulo.

- \*a. SYLVA, L., 1942.—“Diagnóstico em vida da cisticercose cerebral (observações sobre quatro casos).” 7, 223-249.

## 308—Arquivos de Cirurgia Clínica e Experimental.

- \*a. MEIRA, J. A., 1942.—“Estudo clínico das formas pulmonares da esquistossomíase mansônica (doença de Manson-Pirajá da Silva).” 6, 3-136.

## 309—Arquivos do Instituto Biológico. São Paulo.

- a. CUOCOLO, R., 1942.—“Reação fibrosa da parede do estômago de *Tapirus americanus* provocada por *Physocephalus nitidulans* (Schneider, 1866) (Nematoda: Spiruridae).” 13, 271-282. [English summary p. 280.]  
 b. CUOCOLO, R. & MELLO, M. J., 1942.—“Sobre ovos não fecundados e pseudo-operculados de *Ascaris lumbricoides* L., 1758 (Nematoda: Ascaridae).” 13, 283-290. [English summary p. 289.]  
 c. CUOCOLO, R., 1942.—“Relatório helmintológico da excursão científica a Juquía realizado pelo Departamento de Zoologia em setembro e outubro de 1940.” 13, 305-320.

(309c) Cuocolo reports on a helminthological expedition to Juquía, State of São Paulo, in 1940. The hosts examined were: 4 mammals (representing 4 species), 127 birds (48 species),



5 reptiles (3 species), 30 amphibians (3 species), 56 fishes (10 species), and 5 crustacea (all *Trichodactylus* sp.). No new species is recorded, and in many cases the parasites recovered have only been assigned to orders, no generic or specific diagnosis being made. A.E.F.

### 310—Australian Veterinary Journal.

- a. WATSON, R. H. & JARRETT, I. G., 1942.—“Studies on deglutition in sheep: observations on the response of the oesophageal groove mechanism to copper sulphate solution in sheep poor in condition from inanition.” 18 (6), 227–235.

(310a) The oesophageal groove response to copper sulphate occurs as readily in sheep in poor condition as in healthy sheep. R.T.L.

### 311—Bahia Medica.

- \*a. FIGUEIREDO, J., 1942.—“Hematologia da doença de Manson-Pirajá da Silva”; contribuição ao estudo da hematimetria e hemoglobimetria.” 13, 79–82.

### 312—Biological Bulletin.

- a. BRAND, T. VON, 1942.—“Physiological observations upon a larval *Eustrongylides*. II. The aerobic respiration.” 82 (1), 1–13.  
 b. CABLE, R. M. & HUNNINEN, A. V., 1942.—“Studies on *Deropristis inflata* (Molin), its life history and affinities to trematodes of the family Acanthocolpidae.” 82 (2), 292–312.  
 c. MAHR, M. M., 1942.—“Precipitin reactions and species specificity of *Moniezia expansa* and *Moniezia benedeni*.” 83 (1), 88–90.

(312a) Von Brand has examined the respiration of larvae of *Eustrongylides* sp. (probably *E. ignotus*) by the Warburg technique. The osmotic pressure of the medium up to 1.5% sodium chloride did not affect the normal oxygen uptake (140 cu. mm. per g. per hour) but respiratory activity decreased in 2 to 4% solutions. During a week's starvation the oxygen uptake steadily decreased, though the R.Q. ( $1.04 \pm 0.013$ ) was not affected. No aerobic excretion of organic acid was detected. About 30% of the oxygen debt established by a 16 to 18 hours anaerobiasis was repaid in 5 hours after which the oxygen uptake fell to normal. Freshly isolated larvae did not show excessive oxygen uptake and it is considered that they normally live an aerobic life. Larvae of *Trichinella* and *Eustrongylides*, and adult *Ascaris lumbricoides*, have a similar oxygen uptake if it is calculated on a basis of weight rather than surface area. W.P.R.

(312b) Cable & Hunninen describe the life-history of *Deropristis inflata*, a common parasite of eels. The trichocercous cercariae develop in simple rediae in the marine snail *Bittium alternatum* and encyst in *Nereis virens* which is eaten by eels. The family Acanthocolpidae is redefined to include *Lepidauchen*, *Pseudolepidapedon* and *Pleorchis* (the fam. Pleorchidae becoming invalid). The genus *Deropristis* and *Dihemistephanus sturionis* are excluded. The family Lepocreadiidae Nicoll, 1934, is defined and includes the subfamilies Lepocreadiinae Odhner, 1905; Homalometrinae n.n. pro Anallocreadiidae (owing to *Anallocreadium* being synonymous with *Homalometron*); and Deroprististinae n. subfam., containing only *Deropristis*. The Gyliorchenidae are thought to be nearer to this family than to the Paramphistomatidae. The Allocreadiidae is restricted on the basis of cercarial type and excretory system and is related to Acanthocolpidae. The superfamily grouping is as yet uncertain. N.G.S.

(312c) Injections of saline extracts of *Moniezia expansa* and *M. benedeni* were used to produce antisera in rabbits which were later tested by the precipitation technique against the original antigens. This test was sufficiently sensitive to differentiate between the two species in high dilution, the homologous titres for both species being 1:4,000 and the heterologous titres being 1:1,000. P.A.C.

### 313—Biológico. São Paulo.

- a. APICE, M. D., 1942.—“Sobre cinomose e verminose em cães.” 8 (1), 20–21.  
 b. MELLO, M. J., 1942.—“A proposito de diversos parasitas de animais.” 8 (10), 252–254.

(313a) [In the original paper the author is given as J. Mello but an editorial note on p. 114 of the same journal states that this was an error and that the author was M. D'Apice.]



## 314—Boletim do Ministerio da Agricultura.

- a. BRANDÃO, J. S., 1942.—“Os nematóides os meios usuais para o seu controle.” Ano 1941, 30 (7), 9-15.  
 b. PINTO LIMA, J., 1942.—“Peste de secar (verminose gastro-intestinal dos bovinos).” Ano 1941, 31 (4), 17-22.

(314a) This is a general account of *Heterodera marioni*, its life-history and host plants, with methods which have been proposed for its control. M.T.F.

## 315—Boletín de la Academia Nacional de Medicina de Buenos Aires.

- \*a. ITOIZ, O. A., 1942.—“Equinococosis primitiva experimental; inmunidad y alergia en la hidatidosis: su expresión anatómica.” Year 1942, pp. 182-307.

## 316—Boletín de la Asociación Médica de Puerto Rico.

- a. VILAR, R. A., 1942.—“Uncinariasis y el embarazo.” 34 (7), 249-251.

## 317—Boletín del Instituto Botánico de la Universidad Central del Ecuador.

- a. RODRIGUEZ LZ., L., 1942.—“La ‘anguilulosis’ de las papas. *Caconema radicolica* (Greef) Cobb; *Heterodera radicolica* (Greef) Müller.” 1 (1), 160-168.

## 318—Boletín del Instituto de Clínica Quirúrgica. Universidad de Buenos Aires.

- a. FERRARI, R. C. & ALONSO, L. M., 1942.—“Malformaciones de la membrana del quiste hidatídico.” 18 (145), 273-278.  
 b. NINO, F. L., 1942.—“Resultados obtenidos en el tratamiento de la teniasis con ‘Acranil’ (Nota previa).” 18 (145), 279-282.  
 c. RIENZO, S. DI, 1942.—“Broncografía contrastada en el quiste hidatídico pulmonar.” 18 (150), 701-738.  
 d. RIVAS, C. I. & GÓBICH, E., 1942.—“Equinococosis hidatídica de la glándula tiroides.” 18 (150), 739-806.

(318b) Niño has treated a number of cases of *Taenia saginata* infestations with “Acranil”, a proprietary medicine, the chemical composition of which is given. The treatment was 87.5% successful. The head was only found in 4 cases but in the rest of the cases considered cured there was no re-appearance of segments in the faeces in the following months. The substance is easy to administer and does not need to be accompanied by a purge. There is a wide margin of safety between the clinical and toxic doses. A few patients reported transitory symptoms of nausea and jaundice but most suffered no ill-effects. P.A.C.

## 319—Boletín Médico Social de la Caja de Seguro Obligatorio. Santiago.

- \*a. NEGHME, A. & MARTINIC, A., 1942.—“La intradermo-reacción de Bachman para el diagnóstico de la triquinosis.” 9, 717-718.

## 320—Boletín Mensual. Dirección de Ganadería, Montevideo.

- a. HEGUITO, H. R., 1942.—“Trichostrongilosis gastro intestinal de los laneros (lombriz del cuajo de los laneros).” 26 (1), 42-53.  
 b. CASSAMAGNAGHI, A., 1942.—“*Nematodirus spathiger* en los bovinos.” 26 (1), 54-55.  
 c. CASSAMAGNAGHI, A., 1942.—“El genero *Cooperia* en los bovinos—rol patogeno—dos nuevas especies en el Uruguay.” 26 (3), 179-184.

(320a) Heguito gives a general account of trichostrongylosis in sheep with special reference to control and treatment. A preliminary experiment, in which 20 sheep infected with *Haemonchus* and *Nematodirus* were treated with phenothiazine, was successful: no details are given. Further experiments on a larger scale will be carried out shortly. A.E.F.

(320b) Cassamagnaghi records for the first time the occurrence of *Nematodirus spathiger* in cattle in Uruguay, and gives a brief description of the parasite. A.E.F.

(320c) Cassamagnaghi records *Cooperia oncophora* and *C. punctata* for the first time from Uruguay: both species were found in the small intestine and stomach of cattle. The worms are described and their pathogenic role is dealt with very briefly. A.E.F.



## 321—Boletines y Trabajos. Academia Argentina de Cirugía.

- \*a. CALCAGNO, B. N. & CASIRAGHI, J. C., 1942.—“Terapéutica biológica de la equinococosis; hidatidosis peritoneal múltiple.” 26, 615-616.
- \*b. CALCAGNO, B. N., MANFREDI, F. J. & DICKMANN, G. H., 1942.—“Terapéutica biológica de la equinococosis. Equinococosis vertebral. Paraplejía. Absceso osifluente.” 26, 845-861.
- \*c. BASÍLICO, jr., M. V., 1942.—“Pioneuomoquiste hidatídico de hígado.” 26, 1001-1015.
- \*d. SOLÉ, R., 1942.—“Quistes hidatídicos profundos o centrales del hígado. Modelo de trocar a permanencia para su abordaje y curaciones inmediatas.” 26, 1016-1017.

## 322—Boletins da Faculdade de Filosofia, Ciências e Letras. São Paulo.

- a. MENDES, M. V., 1942.—“Anomalia sexual num nemátode marinho.” 25, Zoologia No. 6, 255-265.

## 323—Bollettino della Società Italiana di Biologia Sperimentale.

- a. BELLUCCI, B., 1942.—“A proposito do ascaridiosi del tenue. (Radiodiagnostica e problemi biologici).” 17 (6), 372-374.

## 324—Bollettino della Società Italiana di Medicina e Igiene Tropicale.

- \*a. SIMONETTI, C., 1942.—“Ancora sull'immagine da scollamento della cisti di echinococco.” 1 (1), 69-74.

## 325—Brasil-Medico.

- a. SENRA, J. & FELICISSIMO, O., 1942.—“Contribuição ao estudo das parasitoses humanas em Belo Horizonte.” 56 (49/50), 547-549.

## 326—Bulletin. Connecticut Geological and Natural History Survey.

- a. HOSLEY, N. W., editor, 1942.—“The cottontail rabbits in Connecticut. A report on the work of the Connecticut Wildlife Research Unit.” No. 65, 97 pp.

(326a) This survey of the cottontail rabbits (*Sylvilagus* spp.) of Connecticut includes on pp. 81-87 data on internal parasites. Of 342 rabbits, examined during 1936 to 1938, 135 (40%) were infected with *Obeliscoides cuniculi*, 21 (6%) with *Passalurus ambiguus*, 109 (32%) with *Cittotaenia variabilis*, and 96 (28%) with *Cysticercus pisiformis*: 52 (15%) were negative or parasites. Data on distribution and seasonal incidence of parasites are included. A.E.F.

## 327—Bulletin. Department of Science and Agriculture, Jamaica.

- a. MARTYN, E. B., 1942.—“Diseases of plants in Jamaica.” New Series No. 32, 34 pp.

(327a) In Part III of this comprehensive account of the chief diseases affecting crop plants in Jamaica, Martyn mentions the occurrence of the root-knot nematode, *Heterodera marioni*, as a parasite affecting tomatoes, cabbage, egg-plant, lettuce, cucumber and antirrhinum. Symptoms are briefly described and control methods suggested, including soil sterilization and bare fallowing accompanied with frequent stirring of the soil in dry weather. T.G.

## 328—Bulletin. Missouri Agricultural Experiment Station.

- a. ELDER, C. & CRISLER, O. S., 1942.—“Pathology and comparative damage done by stomach, nodular, and tape worms in sheep.” No. 444, pp. 89-90.
- b. ELDER, C., 1942.—“Internal parasites of sheep.” No. 447, 8 pp.

(328a) A copper sulphate solution of 1.5 % is more efficient than one of 1 % in removing stomach worms from sheep, but is inefficient against nodular worms. R.T.L.

## 329—Bulletin. Oklahoma Agricultural and Mechanical College.

- a. HUGHES, R. C. & SCHULTZ, R. L., 1942.—“The genus *Raillietina* Fuhrmann 1920.” 39 (8), 1-53.



(329a) Hughes & Schultz have summarized the literature on the genus *Raillietina*. The species are first considered individually with numerous references and synonyms: there is a discussion on subgenera which is followed by a host catalogue and an extensive bibliography. P.A.C.

### 330—Bulletin de la Société de Pathologie Exotique.

- a. MONTEL, R., 1942.—“À propos de la communication de M. Deschiens sur les substances toxiques vermineuses.” 35 (4/5), 130-131.
- b. POIRIER, M. & BLONDEL, P., 1942.—“Sur deux tumeurs observées chez des Sénégalais, l'une vésicale due à *Schistosoma haematobium* et l'autre iliaque due à *Onchocerca volvulus*.” 35 (4/5), 161-162.
- c. STEFANOPOULO, G., 1942.—“Prurigo filarien ou gale filarienne dans un cas de filariose à Loa. Présentation de malade.” 35 (4/5), 157-161.

### 331—Bulletin. State of California Department of Agriculture.

- a. HOFFMAN, H. A. & STOVER, D. E., 1942.—“An analysis of thirty thousand autopsies on chickens.” 31 (1), 7-30.

(331a) In an account of the findings at the autopsy of 30,000 chickens, Hoffman & Stover report the presence of various helminths. Ascarids were most numerous in birds of from 3 to 6 months old, and seasonally from April to July. Cestodes were not found in birds under 4 weeks and they tend to abound in the autumn. Gizzard worms tended to appear in older birds and the degree of infestation shows distinct differences from year to year. Helminthology occupies only a very small section of this bulletin, the bulk of the work being concerned with other types of disease. P.A.C.

### 332—Bulletin. Tea Research Institute of Ceylon.

- a. ANON, 1942.—“Nematodes.” No. 23 [Annual Report for the Year 1941], pp. 27-33.

(332a) Gadd presents the results of observations on the effects of starvation for various lengths of time on the females of *Anguillulina pratensis*. Specimens collected from diseased tea roots were kept in damp sand for periods of from 3 days to 18 weeks at which time 20% of them were still alive. In another experiment it was ascertained that such starved worms lose their ability to enter roots. The presence of decaying root material in the damp sand does not improve their ability to enter roots. It was also found that starved worms are practically unable to lay eggs. The general conclusion is drawn that a bare fallow of at least 18 weeks might be of value in seriously reducing the vitality of *Anguillulina pratensis* in the soil. T.G.

### 333—Bulletin. Virginia Agricultural Experiment Station.

- a. THRELKELD, W. L., 1942.—“The sheep parasite problem in Augusta County.” No. 343, 12 pp.

(333a) A simple test is given which indicates a significant degree of infestation of sheep by *Haemonchus contortus*. It depends on the presence of blood in the faeces. Several pellets of faeces are mashed in 5 c.c. of distilled water in a test tube. 240 mg. or about  $\frac{1}{4}$  g. of benzidine powder is dissolved in 2.5 c.c. of 50% glacial acetic acid, and 2.5 c.c. of hydrogen peroxide is added. This, when mixed with the faecal suspension, gives a dark blue colour which lasts for one or two minutes. A list of 16 nematodes and 2 tapeworms which occur in sheep in Augusta County is given. The rest of the observations reported are stated to confirm those previously obtained in Southwest Virginia. R.T.L.

### 334—Bulletin. Washington State Agricultural Experiment Station.

- a. McCULLOCH, E. C. & FULLER, S. A., 1942.—“The efficiencies of phenothiazine and related products in removing and controlling internal parasites in poultry.” No. 425 [52nd Annual Report], pp. 81-82.

(334a) McCulloch & Fuller find that the feeding of phenothiazine in the mash twice a week is effective in removing caecal worms from chickens. It enters the caeca from the intestine and not via the blood stream. It seemed to be non-toxic. They were unable to activate the phenothiazine so that it became active in the upper reaches of the intestine. P.A.C.



## 335—Bulletin. Wyoming Agricultural Experiment Station.

- a. HONESS, R. F., 1942.—“Lungworms of domestic sheep and bighorn sheep in Wyoming No. 255, 24 pp.

(335a) Although *Dictyocaulus filaria* is found in domestic sheep in Wyoming the lung worms of bighorn sheep (*Ovis canadensis*) are species of the genus *Protostrongylus*. The author gives an amended description *P. rushi* Dikmans, 1937, and describes a new species *P. frosti* from the pulmonary parenchyma of *O. canadensis*. *P. frosti*, which is a serious pest in adult sheep, is closely related to *P. stilesi* Dikmans, 1931, from which it differs chiefly in measurement. A description of the pathology of the new species is given in the paper. D.O.A.

## 336—Chinese Medical Journal. Chengtu.

- a. CHANG, K., TONG, W. K., LI, C. H. & CHIN, H. T., 1942.—“The epidemiology and importance of hookworm disease in Szechwan Province. An abbreviated report.” 61A (1) 1-8.  
 b. LI, Y. & CHIEN, Y. C., 1942.—“Cecocolic intussusception in a case of *Schistosomias japonicum*.” 61A (1), 25-28.  
 c. CHIN, T. & LI, K., 1942.—“A survey of the metazoan parasites of the domestic cat *Felis domestica*, of Kweiyang.” 61A (1), 30-36.

(336a) In Szechwan hookworm is widespread and probably more serious than in any other province of China owing to the favourable climatic conditions and to certain agricultural practices. There was no association between hookworm incidence and mulberry cultivation; rice cultivation was also unfavourable and sugar cane growing appeared to be unimportant. The “dry-land” cultivation of miscellaneous crops in the hilly regions produced favourable conditions, while a special association is noticed between the procedure of inter-cropping corn and sweet potato which resulted in ideal conditions for hookworm dissemination. R.T.I.

(336c) From an examination of 120 domestic cats in Kweiyang the following helminths were obtained: *Pharyngostomum caudatum*, 49.17%; *Paragonimus* sp., 7.5%; *Fasciola hepatica*, a single specimen; *Eurytrema* sp., 8 specimens from one cat; *Diphyllbothrium* sp., 67.5%; *Sparganum*, 15.83%; *Taenia taeniaeformis*, 70%; *Dipylidium caninum*, one case; *Toxocara mystax*, 44.17%; *Ancylostoma braziliense*, 36.67%; *Ancylostoma caninum*, 8.33%; *Uncinaria* sp., 2 cases; *Thelazia callipaeda*, 35%; *Chlamydonema praeciputal*, 6.67%; *Cylindrospirura* sp., 2 cases; *Dirofilaria similis*, 2 cases; *Capillaria* sp., 40%. *Clonorchis sinensis* was notworthily absent. R.T.I.

## 337—Chinese Medical Journal. Shanghai.

- a. HU, S. M. K., 1942.—“Studies on the susceptibility of Shanghai mosquitoes to experimental infection with *Microfilaria malayi* Brug. VII. *Culex fuscus* Wiedemann.” 61 (2), 94-97.

(337a) Although it is susceptible to infection *Culex fuscus* is not likely to play an important part in the spread of *Microfilaria malayi* in the lower Yangtze region as it seldom enters dwelling houses or sucks human blood in that region. Out of 68 specimens fed experimentally only 2 produced matured filarial larvae. R.T.I.

## 338—Circular. Georgia Coastal Plain Agricultural Experiment Station.

- \*a. ANDREWS, J. S. & SOUTHWELL, B. L., 1942.—“Control of worms in swine in Georgia. No. 9, 13 pp.

## 339—Clinical Proceedings. Journal of the Cape Town Post-Graduate Medical Association.

- a. CAWSTON, F. G., 1942.—“Safeguarding schoolchildren from schistosomiasis.” 1 (9), 311-314

## 340—Comptes Rendus (Doklady) de l'Académie des Sciences de l'URSS.

- a. MATEVOSYAN, E. M., 1942.—“An analysis of the specific components of the genus *Diploposthe*: cestodes from Anatidae.” 34 (9), 265-268.  
 b. SKRYABIN, K. I. & EVRANOVA, V. G., 1942.—“Palpal apparatus of the male of the nematode *Oxyuris equi*, parasitic of the horse.” 35 (4), 125-128.  
 c. SKRYABIN, K. I., 1942.—“The ways of the phylogenetic evolution of nematodes of the family Pseudaliidae, parasitic of the auditory apparatus, circulatory system and respiratory organs of marine mammals.” 37 (1), 35-40.

(340a) Matevosyan believes that cestodes assigned to the species *Diploposthe laevis* really belong to 3 distinct species. The original *D. laevis* is armed with 10 scolex hooks measuring 0.021 mm. long and of a characteristic shape. There are 3 testes in each segment. Specimens with 14 to 17 testes are referred to a new species *D. skrjabini*, while other specimens possessing only 6 testes are separated off. He does not yet give a new name to this material for he has had no hermaphrodite segments to examine. P.A.C.

(340b) The authors describe the genital papillae of *Oxyuris equi* and contrast its caudal structures with those of *Skrjabinema tarandi*. R.T.L.

(340c) This analysis of the evolution of the Pseudaliidae is based on a morphological study of the male bursa of representatives of all its genera. Skryabin considers the bursa here to be at the beginning of morphogenesis, not the product of retrogressive metamorphosis. In the discussion it is stated that the two new genera mentioned, viz., *Skrjabinalius* Delamure, 1942 (type species *S. cryptocephalus* Delamure, 1942, from the lungs of Black Sea dolphins, *Delphinus delphis*), and *Otophocaenurus* Skryabin, 1942 (type *O. oserskoi* from the auditory apparatus of *Delphinoptera leucos*), have not hitherto been described in the literature. The genus *Halocercus* is divided into two new subgenera *Halocercus* and *Prohalocercus*. A third subgenus *Posthalocercus* Delamure, 1942, created for *Halocercus taurica* Delamure, 1942, is also mentioned although the reference to Delamure's paper (if published) is not given. R.T.L.

### 341—Comptes Rendus des Séances de l'Académie des Sciences.

- a. DESCHIENS, R. & LAMY, L., 1942.—“ Sur les facteurs déterminant l'apparition des pièges chez les hyphomycètes prédateurs de nématodes.” 215 (18/22), 450-452.

(341a) Certain hyphomycetous fungi which capture nematodes by means of ring-like snares or other devices do not develop these special snaring organs when grown in pure culture. When, however, soil nematodes and certain aqueous extracts of substances of animal origin are added to the cultures the trapping devices develop in a few days. Deschiens & Lamy report on experiments in which various substances of animal and vegetable origin were tested on *Dactylella bembicodes*. On the whole the animal substances stimulate production of the trapping devices whereas vegetable substances do not. A positive reaction was also obtained with cultures of a flagellate, *Euglena gracilis*, and the yeast-like fungus *Cryptococcus paramosus*. T.G.

### 342—Cornell Veterinarian.

- a. BRITTON, J. W., MILLER, R. F. & CAMERON, H. S., 1942.—“ The control of parasitism in sheep with phenothiazine in a salt lick.” 32 (4), 400-406.

(342a) A salt lick consisting of 1 part phenothiazine and 15 parts salt proved effective in controlling stomach worms in lambs fed on the irrigated clover pastures in California. Moreover, this mixture was non-toxic when administered over a period of 78 days. The authors express the view that very little absorption of the drug from the intestine would take place from repeated small doses. D.O.M.

### 343—Current Science.

- a. LAL, M. B., 1942.—“ *Heterakis tragopanis*, a new species of the genus *Heterakis* from the intestine of a crimson-horned pheasant.” 11 (10), 388-389.  
b. CHAKRAVARTY, G. K., 1942.—“ A new nematode *Camallanus salmonae* from Kashmir.” 11 (11), 441-442.

(343a) Lal describes and figures *Heterakis tragopanis* n.sp. from the intestine of *Tragopan satyra*. The new species is nearest to *H. gallinae*, *H. bosia* and *H. isolonche*: it differs from all these in the number, shape and arrangement of the caudal papillae, in the size of the spicules, and in other details. A.E.F.

(343b) Chakravarty describes [but does not figure] *Camallanus salmonae* n.sp. from the intestine of *Salmo* sp. in Kashmir, and differentiates it from other *Camallanus* spp. recorded for fishes. A.E.F.



## 344—Deutsche Tropenmedizinische Zeitschrift.

- a. VORETZSCH, A.-M., 1942.—“Über die Entwicklung der Gesundheitsverhältnisse insbesondere der wichtigsten Infektionskrankheiten in Deutsch-Neu-Guinea und im Bismarck-Archipel in den Jahren 1922–1935.” 46 (5), 113–132; (6), 137–152.
- b. GÖTTSCHE, H., 1942.—“Verbreitung der Darminfektionen in Afrika, insbesondere in den deutschen Kolonien.” 46 (14), 373–376.
- c. VOGEL, H., 1942.—“Die Bilharziosen Afrikas und seiner Nachbarländer.” 46 (15), 397–408.
- d. SZIDAT, L., 1942.—“Was ist *Cercaria ocellata* La Valette? Morphologische und entwicklungsgeschichtliche Untersuchungen über den Erreger der europäischen Cercarien-Dermatitis des Menschen.” 46 (19), 481–497; (20), 509–524.
- e. ENGELHARDT, J. C., 1942.—“‘Bayer 205’ in der Diagnostik der Blasenbilharziose.” 46 (24), 597–603.

(344a) On pp. 146–148 of this summary of the incidence of diseases in North East New Guinea and the Bismarck Archipelago, Voretzsch deals briefly with a few helminth infections. Hookworm is widespread, but infections are usually light; creeping eruption occurs rarely. Filariasis is very common throughout the territory, the vectors including *Culex fatigans* and *Anopheles punctulatus*. In 1926 two cases of infection with *Paragonimus westermani* were reported from New Britain. A.E.F.

(344b) Göttische summarizes our knowledge of the distribution of human intestinal disease in Africa, and includes hookworm disease, cestode infections and schistosomiasis. A.E.F.

(344c) In this paper, which forms one of a series of “Merkblätter” [memoranda] issued by the Hamburg Institute of Tropical Diseases, Vogel gives a general account of schistosomiasis in Africa, including infection with *S. haematobium*, *S. mansoni* and *S. intercalatum*. It is intended primarily for army medical officers. A.E.F.

(344d) Szidat has made a detailed systematic study of cercariae of the *ocellata* type responsible for schistosome dermatitis in Europe. He concludes that *Cercaria ocellata* of various authors are distinct species, although similar in morphology and bionomics to *C. ocellata* La Valette. The characteristics of the various species are compared in a table. *C. parocellata* n.sp. from *Limnaea ovata*, and *C. neocellata* n.sp. and *C. pseudocellata* Szidat 1934, from *L. palustris*, are described: they all differ from *C. ocellata* La Valette in the behaviour in water. Comparative measurements show that schistosome cercariae decrease in size, and their flame cells become fewer, as the degree of organization of their hosts increases. e.g., the flame cell formula for avian cercariae is 2 (6 + 1) and for human cercariae 2 (4 + 1) or 2 (3 + 1). Szidat considers that a higher incidence of schistosome dermatitis among users of open air baths is to be expected in view of the increasing numbers of such aquatic birds as ducks, gulls and swans in German towns. A.E.F.

(344e) Engelhardt confirms Kunert's statement [see Helm. Abs., Vol. VIII, No. 72] that intravenous injection of “Bayer 205” [Germanin] greatly increases the passing of eggs in the urine of Schistosomiasis haematobia cases. A single 1 g. dose of the drug is shown to be of the greatest value in the diagnosis of the disease: cases which could not be diagnosed by other means showed eggs in the urine within 18 hours of injection of “Bayer 205”. A.E.F.

## 345—Día Médico.

- \*a. GARCÍA CAPURRO, F., 1942.—“La dislocación brónquica; signo broncográfico patognomónico del quiste hidatídico del pulmón.” 14, 678–681.
- \*b. GRANA, A., 1942.—“El tratamiento biológico de la hidatidosis; su acción sobre algunas manifestaciones de alergia hidática y las modificaciones serológicas que produce.” 14, 1092–1094.
- \*c. IVANISSEVICH, O. & RIVAS, C. I., 1942.—“Tratamiento de los quistes hidatídicos del pulmón.” 14, p. 1201.

## 346—Excerta Médica de la Secretaría de Comunicaciones y Obras Públicas.

- \*a. RODRIGUEZ PEREZ, J. J., 1942.—“El problema de la uncinariasis en la división de Puerto México.” 1, 61–79.

## 347—Florists' Exchange.

- a. CHITWOOD, B. G. & MACHMER, J. J., 1942.—“A new threat to tulips. Stem and bulb eelworm finds a new host.” 98 (11), 9, 15.

(347a) Chitwood & Machmer report considerable damage to tulips of the variety "Pride of Haarlem" due to attack by the stem eelworm, *Ditylenchus dipsaci*. The bulbs were being forced in a greenhouse and some grown out of doors at Babylon, New York, U.S.A. There was considerable breaking-down of leaf tissue with splitting of leaf blades and distortion of flowers and flower stems, whilst the ripened bulbs showed yellowish diseased spongy tissue on the side toward the flower stem. The bulbs had come from a grower in North Carolina whose plantings of the same variety were found, on inspection, to be infected and had been imported originally from Holland in the autumn of 1939. At a later date stray bulbs of a variety named "Telescopium," which were being forced in the same greenhouse in which the "Pride of Haarlem" were affected, were found to be infected with the same eelworm and the grower considered that they were already infected when imported from England in the autumn of 1941. T.G.

### 348—Gaceta Médica de México.

- \*a. TORRES ESTRADA, A., 1942.—"Patogenia de la queratitis punteada de la oncocercosis." 72, 609-618.

### 349—Gardeners' Chronicle.

- a. HOWARD, A., 1942.—"Eelworm disease of potatoes." 111 (2890), p. 207.

(349a) Observations on land infected with the potato eelworm in the Holland Division of Lincolnshire lead the author to conclude that conditions arising from intensive potato growing leading to loss of humus and bad aeration of the soil are the cause of potato sickness rather than the eelworm. In soils where the tilth has been destroyed by bad farming the eelworm gets the upper hand. It is considered useless to start by attempting to destroy the eelworm, and it is thought that the trouble could be eliminated by first restoring the soil texture by the addition of organic matter and sound farming and then attending to the possible mineral deficiencies indicated by Ellenby [see Helm. Abs., Vol. XI, No. 67a]. M.T.F.

### 350—Gastroenterologia.

- \*a. FEISSLY, R., 1942.—"Ascaridiase et radiographie." 67, 64-65.

### 351—Gazeta Clínica.

- \*a. DIAS DE MORAES, J., 1942.—"Novo tratamento da dermatite linear serpiginosa." 40, 369-370.

### 352—Geneeskundig Tijdschrift voor Nederlandsch-Indië.

- a. COLLET, 1942.—"Ascariden in de ductus choledochus." 82 (3), 135-136.

### 353—Göteborgs Kungl. Vetenskaps- och Vitterhetssamhälles Handlingar.

- a. BRINKMANN, jr., A., 1942.—"On some new and little known *Dactylocotyle* species, with a discussion on the relations between the genus *Dactylocotyle* and the 'family' *Diclidophoridae*." 6. Följden, Ser. B, 1 (13), 1-32.  
 b. NYBELIN, O., 1942.—"Zur Helminthenfauna der Süßwasserfische Schwedens. II. Die Cestoden des Welses." 6. Följden, Ser. B, 1 (14), 1-24.  
 c. BRINKMANN, jr., A., 1942.—"A new trematode, *Pachytrema paniceum* n.sp. from the gall-bladder of the lesser black-backed gull (*Larus fuscus* L.)." 6. Följden, Ser. B, 2 (2), 1-19.  
 d. BRINKMANN, jr., A., 1942.—"On '*Octobothrium*' *leptogaster* F. S. Leuckart." 6. Följden, Ser. B, 2 (3), 1-29.

(353a) An attempt has been made by Brinckmann to clarify the systematics of the old family Octocotylidae of the monogenetic trematodes on gills of fishes; numerous nomenclatural changes have been made and groups redefined. *Dactylocotyle macruri* n.sp. is described in detail, from the gills of *Macrurus rupestris* from Skager Rack, and a supplementary description is given of *D. minus* (Olss.) from *Gadus poutassou*. N.G.S.

(353b) Nybelin considers that taeniids recovered from *Silurus glanis*, thought by earlier workers to be all of the same species, represent 2 distinct species. The first is *Proteocephalus*



*osculatus*, and a new genus *Silurotaenia* n.g. is erected for the second, *Taenia siluri* Batsch. Both species are described in detail and their taxonomy discussed. A.E.F.

(353c) The anatomy of *Pachytrema paniceum* n.sp. is described and compared with the original material of the type species *P. calculus* Looss, also a parasite of *Larus* spp. Brinckmann discusses the status of the other species of the genus. N.G.S.

(353d) Brinckmann gives a detailed redescription of *O. leptogaster* from the gills of *Chimaera monstrosa*, and examines its relationships. A new genus, *Chimaericola*, is created for it, and a new family Chimaericolidae. Numerous nomenclatural changes are suggested in related taxonomic groups. N.G.S.

### 354—Harefuah.

\*a. BYCHOVSKY, A., 1942.—“Infection with *Heterophyes heterophyes* in man.” 22, p. 9.

### 355—Hospital. Rio de Janeiro.

\*a. ABREU FIALHO, S., 1942.—“*Cysticercus cellulosae* na câmara anterior.” 21, 675-678.

### 356—Hygeia. Chicago.

a. SHELLEY, M. D., 1942.—“Why don't we trim trichinosis?” 20 (12), 898-899, 940-941.

### 357—Iowa State College Journal of Science.

a. ROUDABUSH, R. L., 1942.—“Parasites of the American coot (*Fulica americana*) in central Iowa.” 16 (4), 437-441.

(357a) Roudabush reports on a parasitological examination of 17 specimens of the American coot, *Fulica americana*, carried out in 1937 in central Iowa. The following helminths were found: *Catatropis pacifera*, *Cotylurus* sp., *Cyclocoelium pseudomicrostomum*, *Echinostoma revolutum*, *Diorchis americana*, *D. acuminata*, *Liga gallulinae*, *Amidostomum chevreuxi*, and *Polymorphus* sp. A.E.F.

### 358—Jornadas Agronomicas y Veterinarias. Universidad de Buenos Aires.

a. SERRES, J. R., 1942.—“Profilaxis de la hidatidosis equinocócica y su legislación, en la República Argentina.” Year 1941, pp. 105-148.

b. PIRES, A., 1942.—“Alergia en el parasitismo con especial referencia a la intradermo-reacción en el diagnóstico de la gastrofilosis equina.” Year 1941, pp. 279-315.

(358b) Pires shows experimentally that *Gastrophilus* and strongyle infestations in horse can be diagnosed by means of the intradermal test, using specific antigen. P.A.C.

### 359—Journal of Allergy.

a. ARBESMAN, C. E., WHITEBSKY, E. & OSGOOD, H., 1942.—“Results of intradermal skin tests with *Trichina* antigen in allergic and normal individuals.” 13 (6), 583-590.

(359a) Arbesman et al. point out that allergic individuals may give a positive reaction to skin tests with *Trichina* antigens so that in medical practice a positive result with no clinical manifestations must be considered carefully. Of an allergic group 22.6% gave positive reactions compared with 7.4% of a control non-allergic group. The complement fixation test is less liable to give false positives. P.A.C.

### 360—Journal of the Department of Agriculture. Victoria.

a. ANON, 1942.—“Parasites of cattle.” 40 (12), 623-631.

### 361—Journal of the Egyptian Medical Association.

a. NAGATY, H. F., 1942.—“On some parasites collected in Egypt from food mammals.” 25 (5/6), 110-111.

(361a) The helminth parasites of camels, cattle and sheep in Egypt are listed. It is noted that *Dicrocoelium dendriticum* and *Fasciola hepatica* are found only in sheep imported from Syria

and *Onchocerca gibsoni* only in cattle from the Sudan. *Schistosoma bovis* occurs in a large percentage of imported Sudanese cattle. Most of the 13 species of nematodes recorded from sheep are reported from Egypt for the first time. R.T.L.

### 362—Journal of Forestry.

- a. DeNIO, R. M. & WEST, R. M., 1942.—“The foot-worm disease in deer of the northern Rocky Mountain region.” 40 (7), 540–543.

(362a) In the northern Rocky Mountain region, and especially in western Montana, foot-rot in whitetail and mule deer, which had been ascribed to infection with *Actinomyces necrophorus*, is due to *Onchocerca cervipedis*. This worm had been identified earlier as *O. flexuosa*. Infection resulted in loss of the hoofs of dew-claws. In slighter infections the soreness reduced mobility and rendered the animal an easier prey to predators. Of 424 deer examined 19% were positive but in the Cabinet National Forest the incidence was 70%. 69% of those infected were adult males. R.T.L.

### 363—Journal of Helminthology.

- a. FENWICK, D. W. & FRANKLIN, M. T., 1942.—“Identification of *Heterodera* species by larval length. Technique for estimating the constants determining the length variations within a given species.” 20 (3/4), 67–114.  
 b. PETERS, B. G. & CLAPHAM, P. A., 1942.—“Infestation with liver fluke among 73,000 cattle slaughtered in Great Britain during June, 1942.” 20 (3/4), 115–138.  
 c. ROGERS, W. P., 1942.—“The metabolism of trichinosed rats during the intermediate phases of the disease.” 20 (3/4), 139–158.

(363a) The authors attack the problem of the measurement of *Heterodera* larvae in order to obtain valid estimates of variations in the larval length. Techniques for obtaining, fixing and measuring the larvae are examined and an investigation is carried out to determine the kind of sample which will give statistically satisfactory information, having regard to the variations in length of the larvae within a cyst, variations in the mean length of larvae from different cysts developed on the same host plant, and variations in mean length of larvae from different host plants. Conclusions are drawn as to the composition of the sample which will give the most reliable estimate of the length variations of larvae from any one host species and a detailed account is given of a standardized procedure for sampling, preparing and measuring the larvae. Using the methods worked out it is hoped to obtain information which may be used for critical comparison of the lengths of larvae of the several species of *Heterodera*, and subsequently for the determination of the species in cysts of unknown origin. M.T.F.

(363b) Peters & Clapham have investigated the incidence of liver-fluke among cattle in Britain in June, 1942, analyzing returns from 486 slaughterhouses involving over 73,000 head of cattle. The data were analyzed from the points of view of time, geographical area, class of cattle, origin of cattle, and degree of infestation. The average incidence of fluke, based on the whole data, was  $17.668 \pm 0.141\%$ , but there was considerable variation among the various sub-divisions. There was no obvious correlation between incidence and intensity of infestation in the different areas, but cows (as to class) and imported cattle (as to origin) show both the highest intensity and the highest incidence in their categories. On the basis of this data, over 600 tons of liver are lost every year as a result of fluke disease, representing nearly £100,000 retail price. Additional data from 5 large abattoirs, covering a period of years, suggests that the loss is actually about  $2\frac{1}{2}$  times larger than has been revealed by this survey. P.A.C.

(363c) Rogers found that the effects of *Trichinella spiralis* on protein digestion in the rat were confined to a period 4 to 12 days after infection. The lowering in protein digestion was roughly proportional to the infective dose used. Urinary inorganic phosphate excretion, which was low during the period 4 to 8 days after infection, rose to a high level some 20 days later. The fall in intestinal calcium assimilation, occurring 4 to 8 days after infection, was repeated 36 days later. W.P.R.



## 364—Journal of Infectious Diseases.

- a. TALIAFERRO, W. H. & SARLES, M. P., 1942.—“The histopathology of the skin, lungs and intestine of rats during passive immunity to *Nippostrongylus muris*.” 71 (1), 69–82.
- b. CAMPBELL, D. H., 1942.—“Experimental eosinophilia with keratin from *Ascaris suum* and other sources.” 71 (3), 270–276.

(364a) Rats, passively immunized with *Nippostrongylus muris*, showed a high but transient immunity. The histopathological lesions in the skin, lungs and intestines showing the primary role of antibodies in this immunity are fully described and illustrated. R.T.L.

(364b) Campbell found that keratins from *Ascaris suum*, sheep wool, rabbit hair, etc. (and probably those from *Nippostrongylus muris*, *Cysticercus taeniaeformis*, and *Trichinella spiralis*) and coagulated ovalbumen gave rise to eosinophilia in guinea-pigs. The eosinophilia reached a maximum 5 to 10 days after injection and a second injection, 30 days after the first, was followed by symptoms characteristic of sensitized animals. Intra-abdominal injections of *A. suum* keratin in amounts about 1 mg. per 100 g. body weight caused marked reactions and gave rise to tissue stimulation followed by abdominal adhesions. In discussing the activity of different fractions, insolubility, antigenicity and the presence of sulphhydryl groups are considered. W.P.R.

## 365—Journal of Laboratory and Clinical Medicine.

- a. DENISON, N., 1942.—“Food remnants as a cause of confusion in the diagnosis of intestinal parasites.” 27 (8), 1036–1042.

## 366—Journal of the Omaha Mid-West Clinical Society.

- \*a. TOLLMAN, J. P., 1942.—“Pinworms—incidence and management.” 3, 74–78.

## 367—Journal of Pediatrics.

- a. JACOBS, A. H., 1942.—“Enterobiasis in children. Incidence, symptomatology, and diagnosis, with simplified Scotch cellulose tape technique.” 21 (4), 497–503.

(367a) Jacobs confirms the value of the simplified technique introduced by Graham [see Helm. Abs., Vol. X, No. 3a] for the diagnosis of *Enterobius vermicularis*, and provides details of his results. Strips of a transparent adhesive cellulose, called in America “Scotch” cellulose tape, are folded over a wooden tongue with the sticky side outward and used as a scraper, the ends of the strip being held by the examiner’s fingers. This scraper is applied to the peri-anal folds of the patient. The tape is then removed and placed on a microscope slide with the adhesive surface down. No artefacts are present in the cellulose. It is claimed that the time occupied in preparing the swab and in cleaning the used glass rods of the NIH method is saved by the new technique. The photograph which accompanies the paper shows about 250 *Enterobius* ova in a single microscopic field. Of 228 children in which the method was used 31.3% gave positive evidence of infection. Attention is drawn to the frequency of a vaginal discharge. This was present in 27.5% of the cases, and of such girls seen at the clinic 11 had *Oxyuris* eggs both in the peri-anal and vulvar regions. R.T.L.

## 368—Journal of the Tennessee Academy of Science.

- †a. CHRISTENSON, R. O. & CREEL, H. H., 1942.—“Soil temperatures and soil moisture as factors governing the seasonal incidence of certain parasitic worms.” 17 (4), p. 341.
- †b. BYRD, E. E. & WARD, J. A., 1942.—“Segmental anatomy of an opossum cestode, *Mesococcestoides* [*Mesococcestoides*] sp.” 17 (4), 341–342.
- †c. BYRD, E. E. & WARD, J. F., 1942.—“Notes on the genital system of the bird fluke, *Apharyngostrigea cornu* (Zeder).” 17 (4), p. 342.

(368a) [This paper appears in full in J. Alabama Acad. Sci., 14, 30–33. For abstract see Helm. Abs., Vol. XI, No. 211a.]

† [Abstract of a paper presented at the 6th Annual Meeting of the Association of Southeastern Biologists, Miami, April 16 to 18, 1942.]

368b) Byrd & Ward describe the anatomy of the segments of *Mesocestoides* sp. from *Didelphis virginiana* from Mississippi. A point of interest lies in the gravid segments, for the tubular uterus persists after the development of the paruterine organ. P.A.C.

368c) The detailed anatomy of the genitalia of *Apharyngostrigea cornu* is described by Byrd & Ward. The course of the egg down the oviduct into the ootype, where it receives yolk from a reservoir and a shell, into the uterus is described. The uterus is joined by the ejaculatory duct. Similarly they trace the course of the spermatozoa from the testes into a storage pouch, thence to a dilated coiled vesicula seminalis. At the point of union with the uterus is found a mass of prostatic glandular cells. P.A.C.

### 369—Journal of the Washington Academy of Sciences.

- a. DRECHSLER, C., 1942.—“Two zoophagous species of *Acrostalagmus* with multicellular *Desmidiospora*-like chlamydospores.” 32 (11), 343-350.

(369a) Drechsler gives an illustrated description of two new species of fungi parasitic in small animal organisms. One of these, *Acrostalagmus goniodes* n.sp., from leaf mould, destroyed nematodes belonging to the genus *Bunonema*; the other, *Acrostalagmus tagenophorus* n.sp. destroyed rotifers. T.G.

### 370—Journal—Lancet.

- a. WRIGHT, W. H., 1942.—“Consideration of clinical and public health aspects of trichinosis.” 62 (11), 389-393.

### 371—Közlemények az Összehasonlító Élet-és Kórtan Köréből.

- \*a. KOTLÁN, A. & VAJDA, T., 1942.—[Versuche zur Behandlung der Spulwurmkrankheit des Schweines.] 30, p. 329.

(371a) Kotlán & Vajda have used “Gilistol” (tetrachlorethylene plus a closely related chlorinated hydrocarbon of different solubility) against *Ascaris* in pigs with great success. In a preliminary experiment 64 young pigs were given a single dose of from 0.8 to 1.0 c.c. per kg. body weight: all worms were removed from 87.5% of the pigs and in the remaining 12.5% infection was greatly reduced. Later 1,976 young pigs were treated, and by the 3rd day a total of 6,538 dead worms had been removed [the degree of infestation of these pigs is not stated]. [From an abstract in Dtsch. tierärztl. Wschr. u. Tierärztl. Rdsch., 51 49, p. 56.] A.E.F.

### 372—Kungl. Fysiografiska Sällskapet i Lund Föreläsningar.

- a. LUNDSTRÖM, A., 1942.—“*Corynosoma mergi* n.sp., eine neue Art der Acanthocephalen.” 11, 103-109.

(372a) Lundström describes and figures *Corynosoma mergi* n.sp. from the small intestine of *Mergus serrator* from the west coast of Sweden. A table compares the characteristics and measurements of this species with those of *C. semerme*, *C. tunitae* and *C. strumosum*. A.E.F.

### 373—Laboratory and Medical Progress.

- a. AWAD, S. H. & ASHOUR, M., 1942.—“Carcinoma of the pancreas with bilharzial infection.” 3 (1), 20-22.

### 374—Leech.

- a. CAMPBELL-BEGG, R., 1942.—“Why is bilharzial disease so frequently undiagnosed?” 13 (2), 7-9.

(374a) Three clinical cases with pain in the inguinal region or abdomen are cited to show that when no evidence of bilharzia infection is obtainable from a microscopical examination of the urine, positive evidence can be obtained by cystoscopic examination. R.T.L.



375—*Lloydia*.

- a. MORGAN, B. B., 1942.—“The nematode genus *Skrjabinoptera* Schulz, 1927.” 5 (4), 314–319.  
 (375a) Morgan emends the diagnosis of *Skrjabinoptera*, all the species of which are parasitic in reptiles, and considers that *S. pallaryi* (Seurat, 1917) should be excluded from the genus and placed in *Abbreviata*. A key is given to the 4 remaining species of the genus, and a parasite-host list is included. A.E.F.

## 376—Medical Parasitology and Parasitic Diseases.

- a. PODYAPOLSKAYA, V. P., 1942.—[The mass diagnosis of cestode infections.] 11 (3), 94–99. [In Russian.]  
 b. PODYAPOLSKAYA, V. P. & KAMALOVA, A. G., 1942.—[Skin tests in the diagnosis of cysticerciasis and cestode infections.] 11 (3), 99–105. [In Russian.]  
 c. PROKOPOVICH, K. V., 1942.—[Helminths in watermen in the Caspian basin.] 11 (3), 105–108. [In Russian.]  
 d. FROLOVA, V. T., 1942.—[Helminths in man in the Novosibirsk district, Western Siberia.] 11 (3), 134–137. [In Russian.]  
 e. PODYAPOLSKAYA, V. P., 1942.—[The mass treatment of taeniasis.] 11 (5), 53–60. [In Russian.]  
 f. TALIZIN, F. F., 1942.—[In vivo action of *Taenia saginata* extracts on the intestine.] 11 (5), 61–66. [In Russian.]  
 g. LEVASHOV, M. M. & MIRONCHENKO, O. A., 1942.—[The epidemiology of helminthiasis in Molotov.] 11 (5), 66–68. [In Russian.]  
 h. KAMALOV, N. G., 1942.—[Contributions to the history of ancylostomiasis.] 11 (5), 69–72. [In Russian.]  
 i. MAKHLINA, R. M., 1942.—[An experiment in control at a focus of ancylostomiasis.] 11 (5), 72–76. [In Russian.]  
 j. SHIKHOBALOVA, N. P. & SEMENOVA, N. E., 1942.—[Clinical aspects and treatment of strongyloidiasis.] 11 (5), 76–83. [In Russian.]

(376a) Podyapolskaya found that the questioning of the population as to the presence of segments in the faeces was the best method for mass diagnosis of infections with *Taenia saginata*. In clinics this method was improved by the examination of anal swabs. For infections with *T. solium* the questioning method combined with the examination of faeces for ova seemed to give the best results. The paper includes tables giving the results obtained from the various techniques used. C.R.

(376b) The authors describe in detail the method employed in the preparation of antigens from *Cysticercus bovis* and *C. cellulosae*. Tests on infected cases showed that the antigen from *C. bovis* was non-specific for *Taenia saginata* in man and for *C. bovis* in cattle and was therefore useless in the diagnosis of these parasites. The tests with antigen from *C. cellulosae* were non-conclusive for *T. solium*. Six tables are included giving the percentage of reactors obtained in man and in cattle and also the percentage of these hosts showing immediate and delayed reactions. C.R.

(376c) Prokopovich found that watermen of the Caspian basin showed a percentage infection with helminths varying from 34.1 to 84.0 in the different ports. The helminths found were *Trichuris trichiura*, *Ascaris lumbricoides*, *Strongyloides stercoralis*, *Ancylostoma duodenale*, *Enterobius vermicularis*, *Hymenolepis nana* and *Taenia* sp. The distribution of helminths in children arranged in age groups gave the following percentages: 0 to 3 years, 21.1%; 4 to 7 years, 48.3%; 8 to 12 years, 59.7%; 13 to 16 years, 44.3%; over 16 years, 28.8%. *Ancylostoma* was prevalent in the southern ports of the Caspian where 27.3% of the population was infected. The author also made extensive observations on the symptoms and on the blood picture of infected persons. C.R.

(376d) Frolova gives the percentage of adults and of children infected with each of the 9 species of parasitic worms found in man in the Novosibirsk district of Western Siberia. The survey is based on 11,859 adults, drawn mainly from those attending communal feeding centres, and on 12,019 children from orphanages, nurseries and schools. Suggestions are made for the more effective control of these parasites in the district. C.R.

(376e) Podyapolskaya found, in the treatment of 1,981 cases of taeniasis, that male fern extract gave an efficacy of 60.7%, pumpkin seeds one of 25%, and carbon tetrachloride

12.5%. Toxic symptoms occurred in 3.5% of the cases treated with male fern extract, and in 5.4% of the cases treated with carbon tetrachloride. They did not occur with pumpkin seeds. The paper includes 7 graphs illustrating the methods and effects of treatment.

C.R.

(376f) Talizin introduced extracts and emulsions of *Taenia saginata* by cannula into the fundus of the stomach of rabbits. He noticed increased tonus of the intestine, depending on the amount of extract used. He considers that the extract had direct action on the smooth muscles of the intestine and on Auerbach's plexus.

C.R.

(376g) The authors took 272 samples from the tributaries of the river Kama running through the town of Molotov. In 15 of these, eggs of *Taenia* sp. were found; in 5, eggs of *Ascaris lumbricoides*; and in one sample eggs of *Enterobius vermicularis*. By smearing glycerine on numerous articles constantly handled by inmates of various institutes the authors also found eggs of *E. vermicularis* in 67.2% of the samples; *Taenia* sp. in 26%; *A. lumbricoides* in 0.6%; and *Hymenolepis nana* in 0.2%.

C.R.

(376h) Reviewing Russian literature on ancylostomiasis, the author concludes that hookworm disease in Georgia and other endemic areas in U.S.S.R. has existed for a long time. He suggests that hookworms, especially *Necator americanus*, were introduced from Africa, Asia and America. Endemic areas in the U.S.S.R. were first discovered in Georgia in 1923.

C.R.

(376i) In a village with a subtropical climate, Makhlina was able to reduce the incidence of hookworm disease from 48.4% to 6.3% with 2 doses of carbon tetrachloride per annum for 2 years. She found that, by withholding dosing for one year, it was only reduced to 21.4%. By giving a total of 5 doses in 32 months incidence was reduced from 48.4% to 5.3%: the average number of eggs in 1 g. of faeces, counted by the Stoll method, was reduced from 4,700 to 410.

C.R.

(376j) The authors have studied 29 cases of strongyloidiasis in the Moscow district during 1939 to 1941 from the clinical, therapeutic, diagnostic, epidemiological and prophylactic aspects. For treatment they administered gentian violet or gentian violet crystals *per os* in capsules containing 0.05 g. three times daily for a period of 8 to 16 days. In some cases additional doses were given by duodenal tube. The authors point out the danger of the spread of strongyloidiasis among soldiers under front-line conditions.

C.R.

### 377—Medical Record and Annals.

- \*a. OUTLAR, L. B., 1942.—“*Oxyuris vermicularis* appendicitis.” 36, 377–378.

### 378—Memorias do Instituto Butantan.

- a. ARTIGAS, P. DE T., RUIZ, J. M. & LEÃO, A. T., 1942.—“Trematóides de ofídios *Liophistrema pulmonalis*, n.g., n.sp. Liophistreminae, n.subfam. *Westella sulina* n.g., n.sp. (Plagiorchidae).” 16, 157–165.
- b. RUIZ, J. M. & LEÃO, A. T., 1942.—“Notas helmintológicas. 1. Três novas espécies de *Opisthogonimus* parasitas de ofídios brasileiros (Trematoda: Plagiorchidae).” 16, 171–176.
- c. RUIZ, J. M. & LEÃO, A. T., 1942.—“Notas helmintológicas. 2. Algumas considerações em torno do gênero *Leptophyllum* Cohn, 1902 (Trematoda: Plagiorchidae).” 16, 187–195.
- d. RUIZ, J. M. & LEÃO, A. T., 1942.—“Notas helmintológicas. 3. Nova espécie de trematóide do gênero *Infidum* Travassos, 1916 (Dicrocoeliidae), parasita de ofídio brasileiro.” 16, 203–206.
- e. RUIZ, J. M. & LEÃO, A. T., 1942.—“Notas helmintológicas. 4. *Choledocystus vesicalis* n.sp., parasita da vesícula biliar de *Bufo marinus* (L.) (Trematoda: Plagiorchidae).” 16, 209–212.

(378a) Two new species, each type of a new genus, are described, viz., *Liophistrema pulmonalis* n.g., n.sp. from the lungs of *Liophis miliaris*, and *Westella sulina* n.g., n.sp. from the mouth and oesophagus of *Philodryas schottii*. Both belong to the Plagiorchidae but as the genital pore in *Liophistrema* is post-acetabular the genus is placed in a new subfamily Liophistreminae. *Westella* is put into the Opisthogoniminae.

R.T.L.

(378b) *Opisthogonimus artigasi* n.sp., *O. fonsecai* n.sp. and *O. pereirai* n.sp. were obtained from Brazilian snakes.

R.T.L.



(378c) *Travtrema* Pereira, 1929, is identical with *Leptophyllum* Cohn, 1902, in the family Plagiorchiidae. The genus now comprises *L. stenocotyle* (type), *L. travtrema*, *L. tamiamiensis* and *L. ovalis*, but the authors think that it will be very difficult to retain these as separate species.

R.T.L.

(378d) The four species of the genus *Infidum*, viz., *I. infidum*, *I. luckeri*, *I. similis* and *I. intermedius* n.sp. are differentiated by a key. The new species is described in detail and is illustrated. It came from the Brazilian snake *Leimadophis poecilogyrus*.

R.T.L.

(378e) *Choledocystus vesicalis* n.sp. from the bile ducts of *Bufo marinus* is differentiated from *C. eucharis*.

R.T.L.

### 379—Memphis Medical Journal.

- \*a. GRAVES, W. R., 1942.—“Intestinal parasites commonly found in children in this locality.” 17, 218-220.

### 380—Military Surgeon.

- a. DIASIO, J. S. & GANNON, J. R., 1942.—“Trichinosis.” 91 (2), 206-208.

(380a) Diasio & Gannon report a case of trichinosis in a soldier at Fort Hancock, New Jersey. The infection was probably acquired from pork sausages eaten some days before the patient was admitted to hospital; diagnosis was based on a marked eosinophilia and a positive intradermal test.

A.E.F.

### 381—Münchener Medizinische Wochenschrift.

- a. KNAPP, A., 1942.—“Genuine Epilepsie und Hirntumoren, Parasiten des Gehirns und Hydrozephalus.” 89 (7), 152-155.

### 382—Nachrichtenblatt für den Deutschen Pflanzenschutzdienst.

- \*a. REINMUTH, E. & ENGELMANN, C. H., 1942.—“Nochmals: die laboratoriumsmässige Auswertung von Nematoden-Freilandversuchen.” 22, 34-35.

(382a) The authors determine the cyst-burden of plants by counting the young cysts or females on measured lengths of root cut from the upper, middle and lower regions of the root stock. It is pointed out that in a suspension of soil taken before the death of the plants young females will all sink, whereas in samples taken after the death of the plants the cysts float. [From an abstract in Zbl. Bakt., II. Abt., 105, p. 302.]

M.T.F.

### 383—New York State Journal of Medicine.

- a. WITEBSKY, E., WELS, P. & HEIDE, A., 1942.—“Serodiagnosis of trichinosis by means of complement fixation.” 42 (5), 431-435.

(383a) Witebsky, Wels & Heide use boiled aqueous extracts of dried and powdered larvae of *Trichinella spiralis* as antigen for diagnosis of the disease by means of complement fixation. The test is sensitive and specific, and being quantitative, can be used over a period of time to measure increase or decrease of antibody.

P.A.C.

### 384—New Zealand Medical Journal.

- a. BARNETT, L., 1942.—“The incidence and prevention of hydatid disease.” 41 (226), 258-259.

(384a) Data from abattoirs and a few general hospitals suggests that there was no decrease in the prevalence of hydatid in New Zealand in the year 1941 except in the district of Christchurch. Here the incidence in animals fell to about 32%. Experiments on the control of the disease under field conditions are being carried out in Central Otago, the results of which will be given later.

P.A.C.

### 385—North Carolina Medical Journal.

- a. STROSNIDER, C. F., 1942.—“Hookworm; an etiologic factor in duodenitis.” 3 (10), 554-555.

## 386—Nova Scotia Medical Bulletin.

- a. REID, J. W. & READ, H. C., 1942.—“Case report. Trichinosis.” 21 (10), 304-309.

## 387—Ohio Journal of Science.

- a. MILLER, J. N. & BUNNER, W. P., 1942.—“The effect of mutilation on the tapeworm *Taenia taeniaeformis*.” 42 (3), 117-121.

(387a) Miller & Bunner show that the cysticercus of *Taenia taeniaeformis* can survive considerable mutilation of the neck, bladder and strobila. Removal or damage does not affect its viability. Fork-tailed strobilae can be produced by an artificial longitudinal incision of the neck: sometimes, however, complete healing occurs with the consequent development of a normal strobila.

P.A.C.

## 388—Ophthalmologia Ibero Americana.

- \*a. TORRES ESTRADA, A., 1942.—“Posibilidad de observar con el oftalmoscopio las microfilarias del vítreo de los pacientes afectados de oncocercosis.” 4, 140-145.

## 389—Plant Disease Reporter.

- a. FOSTER, H. H., GARCIA FORTUÑO, M. & IRIZARRY RUBIO, G., 1942.—“Notes on diseases, decays, and disorders of tobacco in Puerto Rico during the 1941-42 season.” 26 (11), 247-253.  
 b. ARMSTRONG, G. M., 1942.—“Wheat nematode spreading in South Carolina.” 26 (15), P. 337.  
 c. ALTSTATT, G. E., 1942.—“Susceptibility of some common rose understocks to nematode root knot.” 26 (16), p. 371.  
 d. CHITWOOD, B. G., CLEMENT, R. L., MORGAN, R. & TANK, R., 1942.—“*Heterodera rostochiensis*, the golden nematode of potatoes, in New York State.” 26 (18), 390-391.  
 e. GRAHAM, T. W., 1942.—“The meadow nematode on tobacco in South Carolina.” 26 (19), P. 410.  
 f. HOYMAN, W. G., 1942.—“Preliminary evidence suggests guayule may be resistant to the root knot nematode.” 26 (22), p. 476.

(389a) A rather general, though only moderately severe, infection of tobacco with root-knot nematode was observed on an experimental plot at the Río Piedras Station. This disease does not seem to be serious or common in Puerto Rico, possibly because of the heavy clay soil and the periods of drought which occur.

M.T.F.

(389b) Armstrong in a brief note reports that the wheat nematode giving rise to “cockles” or flower galls has become widespread in South Carolina during the past few years. Seven counties are named from which specimens had been received in 1942.

T.G.

(389c) Fourteen varieties of rose understock were grown in sand inoculated with a suspension of eggs and larvae of the root-knot nematode *Heterodera marioni*. After 9 months' growth the roots were examined for galls. Only one variety, *Rosa multiflora* × *R. blanda*, had no galls; infection of the others varied from slight in *Rosa multiflora* upright, *R. setigera* and Ragged Robin, to severe in other varieties of *R. multiflora*, *R. odorata*, *R. manetti*, *R. blanda* and Texas Wax.

M.T.F.

(389d) A survey of 4,841 acres of potato land in Nassau County, Long Island, showed *Heterodera rostochiensis* to be present in 419 acres over an area of  $1\frac{1}{2}$  by 1 mile. It appears to have been introduced to one field in the centre of the area 10 to 14 years ago, and the infestation has increased in that field sufficiently to cause injury and has spread to adjacent land, probably by cultivations and flooding. A brief account is given of the life-history of the eelworm and its probable means of distribution, and recommendations are made for the prevention of its further spread.

M.T.F.

(389e) Graham reports on injury to tobacco roots caused by the meadow nematode, *Pratylenchus pratensis* (de Man) Filipjev, in South Carolina. Attack shows as reddish brown lesions of the secondary roots which later decay and slough off. The signs of attack are thus quite different from those due to root-knot which gives rise to galls. Estimated reduction in yield due to attack by the meadow nematode ranged from 5 to 50% with a calculated



average of 28%. In regard to crop rotation the nematode has been found both on cotton and on corn, which have been crops preceding tobacco in this region. T.G.

(389f) The rubber-producing plant, guayule (*Parthenium argentatum*) was tested in soil heavily infected with *Heterodera marioni*. After 7 months only one out of six plants grown in pots had a few small galls on the roots, though melons grown at the same time were severely affected. Plants grown in an infected field showed no signs of infestation. Further experiments are being made. M.T.F.

### 390—Policlinico.

- \*a. JADEVAIA, F., 1942.—“Falso addome acuto da ascaridiosi.” 49, 13-21.
- \*b. MARIANI, B. & FOJANINI, G., 1942.—“Ricerche sulla comparsa di proteasi specifiche di difesa nell'echinococcosi.” 49, 37-46.
- \*c. GRASSI, A., 1942.—“Pionefrosi calcolosa da pregressa cisti da echinococco.” 49, 131-132.

(390b) Mariani & Fojanini consider the question of diagnosis of hydatidosis by means of Abderhalden's reaction, which is based on dialysis using cyst membrane. The reaction was positive in 53% of 30 hydatid patients. Of these patients 21 gave positive Casoni tests and about a third gave positive Ghedini-Weinberg results. The efficiency of the latter test could be improved by the activating technique of Cattaneo. [From an abstract in Dtsch. tropenmed. Z., 46, p. 589.] P.A.C.

### 391—Praxis.

- \*a. FEIL, L., 1942.—“Zur Wurmfrage in der Schweiz (Gleichzeitig ein Beitrag zur Eosinophilie Ascaridiasis).” 31, 136-139.
- \*b. COUTELEN, F., 1942.—“Fréquence et importance du parasitisme intestinal au cours de la première enfance.” 31 (40), p. 744.

### 392—Prensa Médica Mexicana.

- \*a. MOLINA PASQUEL, C., 1942.—“El tratamiento de las parasitosis intestinales.” 7, 140-144.

### 393—Proceedings of the American Scientific Congress.

- \*a. PÉREZ VIGUERAS, I. & MORENO BONILLA, A., 1942.—“Evolución de la *Fasciola hepatica* y nuevo huésped intermediario para Cuba.” 8th Congress (1940), 3, 113-114.
- \*b. ITURBE, J. F., 1942.—“Invertebrate hosts of *Schistosoma mansoni* and *Paragonimus kellicotti* in the valley of Caracas and in other parts of Venezuela.” 8th Congress (1940), 6, 371-382.
- \*c. STRONG, R. P., 1942.—“Etiology, prevention, and treatment of onchocerciasis.” 8th Congress (1940), 6, 383-392.
- \*d. CRUZ, W. O., 1942.—“Recentes aquisições na ancilostomose; conceito moderno sobre a patogenia, profilaxia e tratamento.” 8th Congress (1940), 6, 399-408.

### 394—Proceedings. Association of Southern Agricultural Workers.

- a. SWANSON, L. E., 1942.—“Internal parasites of cattle.” [Abstract.] 43rd Annual Convention, p. 90.
- b. TAYLOR, A. L., 1942.—“Chemical control of root-knot.” [Abstract.] 43rd Annual Convention, p. 204.
- c. SHAW, L., 1942.—“Results of preliminary experiments on the control of root diseases of the peach.” [Abstract.] 43rd Annual Convention, pp. 204-205.
- d. SMITH, A. L., 1942.—“Further studies on the reaction of commercial cotton varieties to root-knot nematode.” [Abstract.] 43rd Annual Convention, p. 205.
- e. TAYLOR, A. L., 1942.—“Root-knot resistance of five soybean varieties.” [Abstract.] 43rd Annual Convention, p. 205.
- f. THORNE, G., ALLEN, M. W., HARE, J. & LINDSAY, M. A., 1942.—“Populations of root-knot nematode larvae in two Kern County, California, fields.” [Abstract.] 43rd Annual Convention, pp. 205-206.
- g. THORNE, G., 1942.—“Observations on the distribution of the root-knot nematode in high ridge plantings of potatoes and tomatoes.” [Abstract.] 43rd Annual Convention, p. 206.

(394a) In the southern part of the United States, extensive lowlands, mild climate, moisture conditions, sunlight, soil conditions, vegetation, dairy and range farm practices, sanitation, the low nutritional level of farm animals, overstocking and the continued use of fields year after

year are especially conducive to heavy parasitic infestations in cattle. The most important parasites are *Haemonchus contortus*, *Ostertagia ostertagi*, *Trichostrongylus axei*, *Bunostomum phlebotomum*, *Cooperia* spp., *Oesophagostomum radiatum*, *Trichuris discolor*, *Fasciola hepatica* and *Moniezia* spp. For prevention it is advisable that young cattle should not be mixed with older cattle. Both should be provided with minerals and supplementary rations when feed is short. Phenothiazine is recommended in doses ranging from 30 g. to 80 g. following a fasting period of 18 to 24 hours preferably before the winter starts. In heavily infested herds two treatments may be required. R.T.L.

(394b-g) [For abstracts of these papers see Helm. Abs., Vol. XI, No. 71.]

### 395—Proceedings of the Oklahoma Academy of Science.

- a. HUGHES, R. C., BAKER, J. R. & DAWSON, C. B., 1942.—“The tapeworms of reptiles. Part III.” 22, 81-89.
- b. HUGHES, R. C., HIGGINBOTHAM, J. W. & CLARY, J. W., 1942.—“The trematodes of reptiles. Part III. Conclusion.” 22, 90-114.

(395a) This third and final part of a catalogue of reptilian cestodes contains an index of specific names of parasites and 153 references to the relevant literature. [Part I was published in Amer. Midl. Nat., 1941, 25, 454-468; for Part 2, see Helm. Abs., Vol. X, No. 522a.] A.E.F.

(395b) This part completes the catalogue of reptilian trematodes. It consists of an index of specific names of parasites and 427 references to the relevant literature. [For Part 1, see Helm. Abs., Vol. XI, No. 165a; for Part 2, Helm. Abs., Vol. X, No. 285c.] A.E.F.

### 396—Proceedings of the Pacific Science Congress.

- a. PATIÑO-CAMARGO, L., 1942.—“Helminthiasis and protozoiasis in Colombia.” 6th Congress (1939), 5, 527-547.

(396a) Patiño-Camargo surveys the intestinal parasites of man in Colombia. *Ascaris lumbricoides* (with an incidence of 80% in warm and temperate regions) and *Trichuris trichiura* (81%) are very common. The distribution of *Ancylostoma braziliense* and *Necator americanus* has not yet been determined, but the incidence of hookworm in warm and temperate regions is estimated at 88%. *Strongyloides stercoralis* and *Enterobius vermicularis* are not common, and there is very little information about the distribution of cestodes or of *Wuchereria bancrofti*, which has been reported from Colombia. One imported case of *Fasciola hepatica* in man is reported. The control of intestinal parasites in Colombia is discussed in some detail as they are considered to be of great social and economic importance. A list of 15 helminths recovered from domestic animals in Bogotá is also included. A.E.F.

### 397—Proceedings of the Royal Society of Medicine.

- a. YOUNG, M. R., 1942.—“Threadworms in children in England.” 35 (10), 684-685.

### 398—Proceedings and Transactions of the Royal Society of Canada.

- †a. SWALES, W. E., 1942.—“Field trials of control measures for parasitic diseases of sheep.” 3rd Series, 36, p. 158.
- †b. CAMERON, T. W. M. & MILLER, M. J., 1942.—“The incidence of trichinosis and pinworms in man in eastern Canada.” 3rd Series, 36, p. 158.
- †c. COLLIER, H. B., 1942.—“The mode of action of phenothiazine as an anthelmintic.” 3rd Series, 36, p. 163.

(398a) On data from studies on nematode parasites of sheep in Eastern Canada, particularly in respect to the influence of winter temperatures on free-living stages, a system of prevention of harmful infections has been devised. The system involved the use of a form of phenothiazine therapy for breeding stock in the early spring and is practical for widespread use in Canada. Tested under field conditions the incidence of oesophagostomiasis in lambs was

† [Abstract of paper presented at the 61st Annual Meeting of the Royal Society of Canada, Toronto, May, 1942.]



reduced by more than 99%. Verminous gastritis and other parasitic diseases did not occur, in spite of the fact that lambs were not subjected to anthelmintic medication, and considerable increased thriftiness was reflected by market records. R.T.L.

(398b) Cameron & Miller have made a survey of the incidence of trichinosis and pinworm infestation in Canada. Out of 500 unselected diaphragms from a Montreal hospital, only 5 contained *Trichinella* and none were heavily infested. Examination of 787 recruits from Montreal and Kingston by means of a single NIH swab, revealed pinworm infestation in 19% of the men aged from 18 to 21 years, and 10% in those over 21 years of age. P.A.C.

(398c) In summarizing several of his recent publications Collier states that phenothiazine derivatives inhibit catalase, cytochrome oxidase and serum cholinesterase. Certain derivatives also accelerate haemolysis. The bearing of these facts on symptoms observed during treatment is mentioned. The biological activity of phenothiazine is attributed to its molecular structure probably depending on resonance and the formation of semiquinones. W.P.R.

### 399—Publicaciones del Centro de Investigaciones Tisiológicas.

- \*a. BREA, M. M., 1942.—“Quiste hidático del pulmón; pleurodesis por el procedimiento de Bethune.” 5, 379-384.

### 400—Publicações Médicas. São Paulo.

- \*a. MANGABEIRA-ALBERNAZ, P., 1942.—“Mais uma questão de linguagem médica; chistosomose ou esquistosomose?” 13, 63-72.  
\*b. COELHO, B., 1942.—“A esquistosomose no nordeste (ligeiro apanhado ecológico).” 14, 23-28.

### 401—Publications. Association for the Study of Systematics in Relation to General Biology.

- a. SMART, J., 1942.—“Bibliography of key works for the identification of the British fauna and flora.” No. 1, viii + 105 pp.

### 402—Publications. Department of Agriculture, Canada.

- a. KOCH, L. W., 1942.—“Diseases of greenhouse cucumbers.” No. 741 [Farmers' Bulletin No. 112], 12 pp.

(402a) Koch includes a short account of the effects on cucumbers of attack by *Heterodera marioni*. The removal and destruction of affected plants and the replacement or sterilization by steam of the greenhouse soil are given as control measures. Allowing the soil to dry out or freeze, and watering infested areas around posts and at the base of walls with a 1 in 20 solution of commercial formalin are also recommended. M.T.F.

### 403—Publications of the Marine Biological Station, Ghardaqa (Red Sea).

- a. NAGATY, H. F., 1942.—“Trematodes of fishes from the Red Sea. Part 3. On seven new Allocreadiid species.” No. 4, 27 pp.

(403a) Nagaty describes the following new species of trematodes from the alimentary canal of fishes from the Red Sea: *Pseudocreadium sohal* n.sp. and *P. elongata* n.sp. from *Acanthurus sohal*; *P. balistes* n.sp. from *Balistes aculeatus*; *Pedunculacetabulum manteri* n.sp. from *Diagramma cinctum*; *Caudotestis lethrini* n.sp. from *Lethrinus nebulosus*; *Enenteron pimelopteri* n.sp. from *Pimelopterus tahmeli*—which also harboured *Koseiria tahmeli* n.g., n.sp. The new genus is similar to *Coitocaccum* Nicoll, and differs from it mainly by the confluent intestinal crura opening to the exterior by a ventral anus. N.G.S.

### 404—Puerto Rico Journal of Public Health and Tropical Medicine.

- \*a. HERNÁNDEZ MORALES, F., 1942.—“Gastroscopic and rectosigmoidoscopic observations in *Schistosomiasis mansoni*. Preliminary report.” 18, 113-115.  
\*b. HERNÁNDEZ MORALES, F. & ASENJO, C. F., 1942.—“Inactivity of fresh pineapple juice as anthelmintic *in vivo*.” 18, 119-121.  
\*c. POINDEXTER, H. A., 1942.—“Study of intestinal parasites of monkeys of Santiago Island primate colony.” 18, 175-191.

## 405—Records of the Indian Museum.

- a. BHALERAO, G. D., 1942.—“On two helminths of *Mastacembelus pancalus* (Ham.).” 44 (2), 191-192.
- b. MAPLESTONE, P. A. & BHADURI, N. V., 1942.—“Helminth parasites of certain rats in India.” 44 (2), 201-206.
- c. BHALERAO, G. D., 1942.—“On Strigeida (Trematoda) from India.” 44 (2), 207-216.

(405a) Bhalerao reports 2 helminths from the freshwater spiny eel, *Mastacembelus pancalus*: (i) *Azygia angusticauda*, the first record of the genus in India, and (ii) an encysted larva of *Gnathostoma* sp. (probably *G. spinigerum*), the first record of a fish acting as 2nd intermediary for this parasite. A.E.F.

(405b) From 100 specimens of the rat *Mus decumanus*, examined at Calcutta, Maplestone & Bhaduri record 6 species of nematodes, including *Syphacia baylisi* n.sp. and *Capillaria prashadi* n.sp., 5 of cestodes, and 1 acanthocephalan. A further series of unidentified rats, mainly from Ambala District, Punjab, yielded 1 species of nematode and 3 cestodes, none of which is new. A.E.F.

(405c) Bhalerao contributes brief notes on 59 Indian species of Strigeida, “intended to offer criticism in regard to the shortcomings of the descriptions and the wrong interpretations of structure”. *Glossodiplostomoides* n.g. is erected for *Glossodiplostomum hieraetti* Vidyarthi, 1938. *Neoalaria thaparia* Lal is transferred to *Diplostomum*, *Neodiplostomoides mehrii* Vidyarthi and *Pharyngostomum bagulum* Lal to *Neodiplostomum*, and *Crassiphiala ceryliformis* Vidyarthi and *C. stunkardi* Pande to *Uvulifer*. A.E.F.

## 406—Records of the South Australian Museum.

- a. JOHNSTON, T. H. & MAWSON, P. M., 1942.—“Remarks on some parasitic nematodes.” 7 (2), 183-186.
- b. JOHNSTON, T. H., 1942.—“The metacercaria stage of Australian species of *Clinostomum*.” 7 (2), 187-191.

(406a) Johnston & Mawson describe *Dispharynx pelecani* n.sp. from *Pelecanus conspicillatus*: it differs from other members of the genus in length of vestibule, position of cervical papillae, and the form of the male tail and spicules. *Anisakis kogiae* Johnston & Mawson, 1939, is reduced to the synonymy of *A. simplex*. *Phalacrocorax fuscescens* is recorded as a new host of *Eustrongylides phalacrocoracis*. Brief notes on *Paryseria pachyptilae*, *Cosmocephalus jaenschii*, *Tetrameres pelecani* and an *Anisakis* sp. are included. A.E.F.

(406b) The metacercarial stage of *Clinostomum australiense* S. J. Johnston, has been found by T. H. Johnston to encyst in the bony bream, *Nematalosa elongata*, from Queensland; its anatomy is described and compared with the type material of the adult from *Anhinger novaehollandiae*—it is suggested that this is not the normal host, since related species are from Ardeiformes. Tabular comparisons show that *C. hornum* Nicoll is a synonym of *C. complanatum* (Rud.): its metacercaria has been found in the peritoneal cavity of the goby, *Carassius gulosus*, and encysted on the gill of *Therapon hillii*, both from Queensland. N.G.S.

## 407—Recueil de Travaux de Sciences Médicales au Congo Belge.

- \*a. PIERAERTS, G., 1942.—“Étude sur le syndrome dépigmentation-oedème au Kasai.” Year 1942, pp. 104-124.

## 408—Report of the Chief of the Bureau of Animal Industry. United States Department of Agriculture.

- a. UNITED STATES. BUREAU OF ANIMAL INDUSTRY, 1942.—[Report of the Zoological Division.] Year 1941-1942, pp. 39-46.

(408a) This report contains brief summaries of work done on strongyle parasites of the horse. Apparently horses can benefit from a single treatment with one full therapeutic dose per annum if this is given in the summer when the parasite load is high, and treatment with small doses of the drug mixed with the food for several weeks is of definite value, as an adjunct, in assisting in the elimination of infective larvae from the pastures. Work on ruminants shows



that 42% of adult cattle, 7.5% of calves and nearly all sheep in the vicinity of Angleton, Texas, were infected with liver fluke. 4.5% of the snail vectors were found infected. Doses of less than 80 g. of hexachlorethane per animal were 99% effective in half of the cases treated. When the dose was raised to 80 g.-100 g. all flukes were removed from 40 out of 47 cattle, but occasionally animals died from the treatment. Heavy infections with *Oesophagostomum columbianum* rendered the intestines of lambs unfit for casings or for surgical suture material. The wool was inferior, having weak spots, discolouration and breaks in the fibres. Relatively small numbers of infective larvae of these nodular worms survive the winter. Milk in the diet adversely affects *Haemonchus contortus*. The resting of the pastures for about 6 weeks in the spring or autumn sufficed to rid them of infective lungworm larvae. In pigs *Strongyloides ransomi* has been found to be a hitherto unrecognized cause of death. The infective larvae on pastures do not survive beyond a month and the eggs fail to develop during the winter. On pastures therefore heavy infections are not likely. That pigs free from trichinae give positive reactions with *Trichinella* antigen is due to sensitivity to the chemicals used as diluents. 10% of 450 rats trapped in packing houses in Chicago were infected with trichinae, often in large numbers. The incidence in mice was only 1%. *Capillaria caudinflata*, known hitherto only in turkeys, is reported as a cause of severe enteritis in chickens. Earthworms spread the infection. Phenothiazine at the rate of 25 g. per animal can be given with safety to pregnant ewes if incorporated in the feed. There is a marked but infrequent idiosyncrasy among horses to phenothiazine. A satisfactory anthelmintic for swine is urgently required. In limited trials of a number of drugs for anthelmintic action only 2-chlorobutene-2 was satisfactory in dogs but it caused liver and kidney damage. An unidentified substance from oil of rose geranium showed promise. [Part of this information appears separately and in more detail in scientific publications.]

R.T.L.

#### 409—Report of the Chief of the Bureau of Plant Industry. United States Department of Agriculture.

- a. ANON, 1942.—“*Crotalaria spectabilis* immune to root knot nematode.” Year 1941-1942, pp. 18-19.

(409a) Since chemical control of root knot and other plant parasitic nematodes is too expensive for use in the field, a search has been made for immune or resistant plants which could be grown in crop rotations on infected land. It has been found in extensive tests that, although root knot nematode larvae enter the roots of *Crotalaria spectabilis*, individuals rarely reach the adult stage and reproduction has never been observed. Velvet beans (*Richardia scabra*) and Bermuda grass also show marked resistance, i.e. very few of the numerous larvae which enter the roots produce offspring.

M.T.F.

#### 410—Report of the Province Game Commission, British Columbia.

- a. COWAN, I. McT., 1942.—“Report upon some diseases and parasites of game birds and game and fur-bearing mammals in British Columbia.” 1941. [Reprint 6 pp.]

(410a) Cowan records *Fascioloides magna* from *Odocoileus hemionus*, *Skrjabinylus* sp. (? *chitwoodorum*) from *Spilogale gracilis*, *S. nasicola* from *Mustela cicognanii*, *Taenia taeniaeformis* and *Toxascaris leonina* from *Lynx fasciatus*, *Taenia taeniaeformis* and *Belascaris mystax* from the cat, *Taenia taeniaeformis* and *T. hydatigena* from *Felis concolor*, *Toxascaris transfuga* from *Euarctos americanus*, *Stichorchis subtriquetrum* and *Travassosius rufus* from *Castor canadensis*. *Taenia serialis* (larva) from *Lepus americanus*, and *Nematodirus* sp. and *Trichuris ovis* from *Ovis canadensis*.

A.E.F.

#### 411—Revista de Agricultura. São Paulo.

- a. CARVALHO, R. DE S., 1942.—“Sobre a ocorrência de um nematóide nas raízes das plantas cítricas.” 17 (8/10), 347-352.  
b. CARVALHO, R. DE S., 1942.—“O nematóide das raízes das plantas cítricas—*Tylenchul us semipenetrans* Cobb—e sua possível relação com a doença ‘podridão das radículas’.” 17 (11/12), 423-434.

(411a) Carvalho reports the presence of the nematode, *Tylenchulus semipenetrans*, on the roots of orange trees suffering from root rot at various orange plantations in the State of São Paulo, Brazil. The paper is in the nature of a preliminary communication, giving an account of the symptoms shown by the orange trees without concluding that *T. semipenetrans* is actually the cause of the malady. T.G.

(411b) Carvalho deals with the occurrence of the citrus root nematode, *Tylenchulus semipenetrans*, on the roots of citrus in various districts of the State of São Paulo, Brazil, and its constant association with a condition called rootlet rot (podridão das radículas) which is widespread there. He describes the symptoms of this disease both on root and shoot, gives a brief account of the structure of the nematode, and discusses possible control measures. T.G.

#### 412—Revista Argentina de Neurologia y Psiquiatria.

- \*a. FRACASSI, T. ET AL., 1942.—“Cisticercosis cerebral.” 7, 1-27.

#### 413—Revista de la Asociación Médica Argentina.

- \*a. JORGE, J. M. & RE., P. M., 1942.—“La hidatidosis y su tratamiento biológico.” 56, 5-11.  
 \*b. LONGO, O. F., 1942.—“Quiste hidatídico de la glándula tiroides.” 56, 37-39.  
 \*c. MAININI, C., 1942.—“La hidatidosis desde el punto de vista de la medicina humana.” 56, 312-317.  
 \*d. JORGE, J. M., ITOIZ, O. A. & LATIENDA, R. L., 1942.—“Equinococosis multilocular de los bóvidos con necrosis central.” 56, 393-394.

#### 414—Revista Chilena de Higiene y Medicina Preventiva.

- a. MARTINIC M., A., 1942.—“Estudio sobre triquinosis en Santiago, con especial referencia a su importancia clínica y epidemiológica y a la intradermo reacción diagnóstica de Bachman.” 5 (2), 131-165. [English summary p. 163.]

(414a) From an examination of the diaphragms of over 200 unselected cadavers autopsied at the Hospital Salvador y del San Vicente, Santiago, Chile, Martinic found *Trichinella* larvae in 13%. He gives a detailed clinical study of 48 cases of trichinosis which occurred in Santiago in 1941-42; of these, 30 were males and 18 females. All the patients who had been ill not less than 10 days and not more than 38 days gave a reaction with Bachman's intracutaneous test, while the delayed type of reaction occurred in all convalescent patients and those who had been patients 3½ months previously, while of those who had had the disease a year or more previously a positive reaction occurred in 42%. R.T.L.

#### 415—Revista de Cirurgia de São Paulo.

- \*a. SOARES HUNGRIA, J., OLYNTHO ARRUDA, M. & PAONESSA, H., 1942.—“Considerações sobre dois casos de abdômen agudo; síndrome abdominal agudo por brida peritoneal e *Ascaris*.” 8, 247-256.

#### 416—Revista de la Facultad de Agronomía y Veterinaria. Buenos Aires.

- a. CÁMPORI, A. S., 1942.—“Diagnóstico de las teniasis en el perro por el método del hisopo.” 9, 170-180. [English summary p. 179.]

(416a) Cámpori has adapted the swab method first described by Bacigalupo for the diagnosis of taenias in dogs. A small swab, soaked in glycerin is gently rubbed on the peri-anal regions and among the rectal mucosal folds. When cleaned in a drop of glycerin on a slide the eggs are visible for diagnosis. It is not advisable to wash the animal for 7 days previous to examination or the eggs will be removed. P.A.C.

#### 417—Revista del Instituto de Salubridad y Enfermedades Tropicales. Mexico.

- a. MAZZOTTI, L. & OSORIO E., M.T., 1942.—“Comparación de las técnicas de Hall y de Graham en el diagnóstico de la oxiuriasis.” 3 (4), 323-328. [English summary p. 327.]

(417a) Mazzotti & Osorio get better results in examining children for *Oxyuris* with Graham's method of adhesive tape than with Hall's NIH swab. In one survey the swab showed



30% of the children to be positive while simultaneous examinations with the tape showed 45% to be positive. A further advantage lies in the fact that only simple materials are required and the technique is very straightforward.

P.A.C.

#### 418—Revista Medica da Bahia.

- \*a. FIGUEIREDO, J. DE, 1942.—“A reação de Takata-Ara na doença de Manson-Pirajá da Silva” (contribuição ao seu estudo).” 10, 224-230.

#### 419—Revista Médica de Chile.

- a. ALESSANDRI, H. & NEGhme, A., 1942.—“Estudio clínico sobre triquinosis.” 70 (9), 690-696.

(419a) Alessandri & Neghme consider that trichinosis is endemic in Chile, but the majority of cases are of a mild form which clears up within 4 to 5 weeks. It is stated that 10% of 166 diaphragms of patients with no clinical history of trichinosis were positive for *Trichinella*. A general account of the disease, based on a series of cases in a Santiago hospital, is included.

A.E.F.

#### 420—Revista Medica de Pernambuco.

- \*a. TAVARES, L. & MELO, C. DE, 1942.—“Leucemia mieloide e esquistosomíase mansônica.” 12, 283-301.

#### 421—Revista de Medicina Tropical y Parasitología, Bacteriología, Clínica y Laboratorio.

- a. HERMAN, C. M., 1942.—“The effect of higueronia on nematodes and nemathelminthic gastric ulcers of California sea lions.” 8 (4), 45-47.  
b. PERRIN, T. G., 1942.—“Algunos estudios sobre triquinosis ignoradas.” 8 (5), 59-64.

(421a) Gastric ulcers are commonly associated with infestation with Anisakinae in sea lions. Fig latex preserved by refrigeration proved an excellent vermifuge. It also was found to be a much more efficient vermifuge than higueronia for *Trichuris* in dogs.

R.T.L.

(421b) [This paper appeared also in Rev. Med. Trop. Parasit., 8, 59-64. For abstract see Helm. Abs., Vol. XI, No. 187a.]

#### 422—Revista de Medicina Veterinaria. Buenos Aires.

- a. BASTERRECHEA ELORRIETA, L. DE, 1942.—“Notas sobre ‘la cisticercosis porcina’ en el matadero de ‘La Ganadera Industrial Venezolana’.” 24 (11/12), 536-539.

(422a) Of 7,564 pigs examined in Venezuela 310, or 4.09%, were infected with *Cysticercus cellulosae*; 71 showed heavy and 239 light infections. The sites most affected (in order of frequency) were: shoulder muscles, masseters, neck muscles, diaphragm and intercostal muscles, leg muscles, heart muscles, and tongue. The importance of examining other less frequently affected sites is however stressed. It is stated that infected carcasses kept at temperatures of from 1° to 4° C. for 4 weeks contained no viable larvae.

A.E.F.

#### 423—Revista de la Policlínica Caracas.

- a. VALENCIA PARPARCÉN, J., 1942.—“Tratamiento médico de la Schistosomiasis mansoni en los adultos.” 11 (67), 293-307.  
b. PRIETO CASANOVA, J. T., 1942.—“Contribución al estudio de los infiltrados pulmonares fugaces.” 11 (67), 323-356.

#### 424—Revista de Sanidad y Asistencia Social.

- \*a. PIFANO C., F. & MAYER, M., 1942.—“Sobre el comportamiento de la reacción de Fairley en los estadios clínicos de la Schistosomiasis mansoni.” 7, 379-396.  
\*b. LUTTERMOSER, G. W. & PIFANO C., F., 1942.—“Aspectos epidemiológicos de la Schistosomiasis mansoni en San Casimiro (Estado Aragua), Venezuela.” 7, 397-418.  
\*c. MAYER, M. & PIFANO C., F., 1942.—“Estudios biológicos y patológicos en animales infectados con *Schistosoma mansoni* (infecciones bi- y unisexuales).” 7, 419-428.  
d. SCOTT, J. A., 1942.—“La epidemiología de la schistosomiasis en Venezuela.” 7 (6), 771-809.  
e. JAFFE, W., 1942.—“Leche de higuerón.” 7 (6), 837-846.

(424d) [This paper appeared originally in English in Amer. J. Hyg., 1942, 35, 337-366. For abstract see Helm. Abs., Vol. XI, No. 89a.]

425—Revista de la Sociedad Mexicana de Historia Natural.

- a. BELTRAN, E., 1942.—“Hallazgo de microfilarias en aves Mexicanas.” 3, 85-86.

426—Revista de la Sociedad de Pediatría de Rosario.

- \*a. HUARQUE FALCON, J., 1942.—“Catastro de infestación por zooparásitos intestinales en los niños escolares del departamento Garay.” 7, 127-132.

427—Revista de Tuberculosis del Uruguay.

- a. PIAGGIO BLANCO, R. A., DIGHIERO, J. & MALOZETTI, H., 1942.—“Hidatidosis de la primera costilla con sombra quística del ápex pulmonar y síndrome de Claudio Bernard Horner.” 10 (6), 430-433.

428—Revue Canadienne de Biologie.

- a. MILLER, M. J., 1942.—“Black spot disease of speckled trout.” 1 (4), 464-471.

(428a) “Black spot” which is widely distributed throughout the lakes of Quebec in speckled trout is due to encysted cercariae of *Apophallus brevis*. The intermediate host is *Ammicola limosa* and the definitive host *Gavia immer*. The disease has been produced experimentally in the brown trout. Rainbow trout are refractory to infection. It does not occur in lake trout.

R.T.L.

429—Royal Melbourne Hospital Clinical Reports.

- a. OFFICER-BROWN, C. J., 1942.—“Hydatid disease of the lung.” 13, 66-71.

430—Schweizerische Medizinische Wochenschrift.

- a. JAFFÉ, R., 1942.—“Was lehrt uns die Bilharzia-Zirrrose in Bezug auf die Probleme de Leber-Zirrrose?” 72 (42), 1149-1154.

431—Semana Médica.

- \*a. BACIGALUPO, J. & RIVERO, E., 1942.—“Estadística de los análisis parasitológicos realizados en el laboratorio de la Cátedra durante los años 1939, 1940 y 1941.” Año 49, 2, 381-385.

432—Skandinavisk Veterinär-Tidskrift.

- a. ROTH, H. & CHRISTENSEN, N. O., 1942.—“On parasitic gastritis in the horse due to *Trichostrongylus axei*.” 32 (7), 488-514.

(432a) After a review of earlier literature on *Trichostrongylus axei*, Roth & Christensen give a detailed description of the worm, illustrated with microphotographs, and discuss its bionomics, life-history and geographical distribution. During the period February 1941 to February 1942 they examined the stomachs of 100 horses in Denmark, and found *T. axei* in 36 cases. The parasite had not previously been reported from Scandinavia. A detailed description of the pathology of *T. axei* in the horse's stomach is added. Other helminths recovered were *Habronema muscae* (31 cases), *H. microstoma* (6 cases), *Habronema* sp. larvae (10 cases), and *Ostertagia ostertagi* (3 cases).

A.E.F.

433—Tasmanian Journal of Agriculture.

- a. PHILP, R. C. T., 1942.—“Parasites in relation to animal health.” 13 (4), 147-149.



## 434—Tierärztliche Rundschau.

- a. SCHOOP, G., 1942.—“Verbreiten die deutschen Edelpelztierzuchten die Trichinellen?” 48 (37/38), 311–313.  
 b. WINTERHALTER, M., 1942.—“Ein Beitrag zur Wirkung des Tetrachlorkohlenstoffes beim Schaf.” 48 (37/38), 315–318.

(434a) In Germany carcasses of wild foxes and badgers are frequently infected with *Trichinella spiralis*. The feeding of uncooked carcasses is now prohibited. R.T.L.

(434b) Winterhalter administered 4.32 g. carbon tetrachloride to ten sheep and on each of the ten following days one of the animals was slaughtered and post-mortemed. Only the liver was affected, and details are given of changes found in this organ on each day. On the first day necrobiosis was observed, on the 2nd there was necrotic haemorrhagic inflammation round the central vein. After the 3rd day the inflammation gradually diminished, and by the 4th day regeneration of the liver epithelium had started. By the 9th day the parenchyma was normal and the liver healthy. Severe fatty degeneration, which had been observed on the 2nd day of similar experiments with rats, rabbits and pigs, did not occur with sheep. A.E.F.

## 435—Trained Nurse and Hospital Review.

- \*a. McMULLEN, D. B., 1942.—“Swimmer’s itch.” 108 (6), 422–425.

## 436—Transactions of the American Microscopical Society.

- a. WILLEY, C. H. & STUNKARD, H. W., 1942.—“Studies on pathology and resistance in terns and dogs infected with the heterophyid trematode, *Cryptocotyle lingua*.” 61 (3), 236–253.  
 b. KAY, M. W., 1942.—“Notes on the genus *Merizocotyle* Cerfontaine, with a description of a new species.” 61 (3), 254–260.  
 c. KAY, M. W., 1942.—“A new species of *Phyllobothrium* van Beneden from *Raja binoculata* (Girard).” 61 (3), 261–266.  
 d. AMEEL, D. J., 1942.—“Two larval cestodes from the muskrat.” 61 (3), 267–271.  
 e. TODD, A. C., 1942.—“A new parasitic nematode from a water scavenger beetle.” 61 (3), 286–289.

(436a) Evidence for tissue penetration of final hosts by heterophyid trematodes is examined. The resistance evoked by some forms is variable, even in related hosts, and this is confirmed by the experiments of Willey & Stunkard who fed cysts of *Cryptocotyle lingua* to terns and dogs. Immunity is established in both, but more rapidly in terns, though it is not total in either. A protracted infection of low intensity serves to protect the host against further heavy infection. After feeding nestling terns on cysts of *C. lingua* for 14 days there was a decline in infection and live worms were voided: necropsy showed a slight intestinal desquamation which was soon repaired. Dogs fed for the same period showed marked pathological effects and the infections tended to be fatal if continued for more than a few days: necropsy showed extensive sloughing of the intestinal mucosa accompanied by other local damage, though no worms were found in the glands or anywhere below intact tissue, nor was there any evidence for tissue penetration by young or fully mature worms in terns. N.G.S.

(436b) Kay gives a detailed description of *Merizocotyle pugetensis* n.sp. from the nostrils of *Raja binoculata* from Puget Sound. She reviews some of the related species and creates *Pseudomerizocotyle* n.g. for *Merizocotyle dasybatis* MacCallum. N.G.S.

(436c) *Phyllobothrium radioductum* n.sp. is described by Kay from *Raja binoculata* from Puget Sound. It differs from other species by the upper surface of the bothria being spiny, and the dorsal and ventral excretory vessels being equal in size: their arrangement in the scolex is described in detail. N.G.S.

(436d) Ameel has recovered 15 helminth species from muskrats, *Ondatra zibethica*. Two kinds of proliferating cestode larvae, to which definite species could not be assigned, are included. The first species, from liver, spleen, lungs and kidneys, resembled a coenurus, and scolices from it were not infective to a cat. The second species was found in the liver and in sacs on the mesentery. Many of the bladders were united by a common stalk or bladder, though a small percentage were typical cysticerci. These were not infective to cats, black fox

or great horned owl. It is pointed out that cestode larvae are not easy to differentiate without feeding experiments. P.A.C.

(436e) Todd gives a technical illustrated description of a new oxyurid nematode belonging to the Thelastomatidae occurring in the large intestine of the water scavenger beetle, *Tropisternus nimbatius*. The worms are placed in a new genus *Zonothrix* under the name *Zonothrix tropisterna* n.g., n.sp. They differ from *Pseudonynus*, the most closely related species, in the vulva being situated in the posterior third of the body, in the elongated anterior lip of the vulva, and in the absence of cuticular rings on the head. T.G.

#### 437—Transactions of the Kansas Academy of Science.

- a. BOZEMAN, jr., W. B., 1942.—“An experimental investigation into the life history of *Blatticola blattae*, a nematode found in *Blattella germanica*.” 45, 304-310.

(437a) Bozeman has found that the nematode *Blatticola blattae* occurring in the large intestine of the cockroach, *Blattella germanica*, is found in small numbers only, never more than 4 worms being present in one insect. Female cockroaches harbour more worms than males. Development of the worm takes place as far as the “resting” stage at which stage the larvae are infective. The presence of the parasite does not appear to have any effect on the vital activities of the host insect. T.G.

#### 438—Transactions and Proceedings of the Royal Society of New Zealand.

- a. FYFE, M. L., 1942.—“The anatomy and systematic position of *Temnocephala novae-zealandiae* Haswell.” 72 (3), 253-267.

#### 439—Urologic and Cutaneous Review.

- a. SCHWARZ, E. G., 1942.—“Creeping eruption.” 46 (12), 782-784.  
b. ESTELLITA FILHO, 1942.—“The surgical treatment of hematochyluria.” 46 (12), 789-791.

#### 440—Växtskyddsnötiser.

- a. HOLMBERG, C., 1942.—“Potatiskräfta och potatisäl i Sverige under 1941.” 1942, No. 1, 6-8.

(440a) An account is given of the occurrence and distribution of potato eelworm in Sweden in 1941. It has been found on many allotments. Infected areas are scheduled and potato cultivation in them is regulated. The importance of the restriction of potato growing in infected areas to prevent the spread and increase of the eelworm is strongly emphasized. M.T.F.

#### 441—Veterinary Student. Iowa State College.

- a. STODER, K. W., 1942.—“Sheep nodule worms. Parasite is causing suture shortage.” 5 (2), 64-65.  
b. FISTLER, R. P., 1942.—“Toxic results from phenothiazine.” 5 (2), p. 74.

(441b) Sixty-four apparently normal pigs of about 35 lb. weight were treated for *Ascaris* with one ounce of a commercial suspension containing 12.5 g. of phenothiazine. About one-third showed symptoms on the following day. Several were completely paralyzed in the hind quarters. The Tallqvist haemoglobin scale gave a reading of 60 to 70. On the second day some showed apparent blindness but the rest had improved and all the pigs had recovered a few days later. R.T.L.

#### 442—Wiener Klinische Wochenschrift.

- a. HATIEGANU, J. & FODOR, O., 1942.—“Symptomenkomplex der chronischen Hypoglykämie bei der Trichinose.” 55 (41), 807-809.

(442a) Hatieganu & Fodor report an outbreak of trichinosis in Rumania in the winter of 1941-1942. Of 26 persons affected after eating the flesh of a pig which had not been subjected



to meat inspection, 1 died, 3 were severely infected and the remaining 22 showed light infections. As a result of the examination of these cases the authors conclude that hyperglycaemia is an important symptom in trichinosis. They recommend treatment with Fouadin + glucose.

A.E.F.

#### 443—Wiener Tierärztliche Monatsschrift.

- a. WIRTH, D., 1942.—“Chenopodiumöl als Wurmmittel bei Pferden.” 29 (14), 321–329.

(443a) Wirth has examined the efficiency of oil of chenopodium as an anthelmintic in horses. A proprietary preparation known as “Kebal II” in conjunction with castor oil in doses of 15 to 20 ml. was quite effective against strongyles, but was less so against ascarids though it had previously been reported as being good for eliminating roundworms in dogs. There is not a wide margin of safety between the clinical and the lethal dose and it is not to be recommended for animals in a debilitated or weakly state or in cases complicated by fever. Its use was sometimes associated with a slight rise of temperature, increased pulse rate and a temporary loss of appetite, but these symptoms did not occur if the castor oil was replaced by paraffin oil, due possibly to a decrease of the absorption of the oil.

P.A.C.

#### 444—Zeitschrift für Ärztliche Fortbildung.

- \*a. BRANDT, M., 1942.—“Ueber Trichinose.” 1942, p. 525.

#### 445—Zeitschrift für Parasitenkunde.

- a. LEHMENSICK, R., 1942.—“Über die Veränderungen am Iltisschädel durch den Befall mit *Trogloremma acutum*.” 12 (6), 659–664.  
b. GÜNTHER, H., 1942.—“Geschlechtsunterschiede im Parasitenbefall des Menschen.” 12 (6), 678–690.

(445a) From an examination of 2 polecat skulls from the collection at the Zoological Institute of the University of Bonn, Lehmensick describes the effect of *Trogloremma acutum* infection. Although the skull cap and the base of the frontal sinus may be severely affected no important changes in the bony parts of the turbinates were observed, even when large numbers of the parasite were present in the mucous membrane of the inner nose. The lamina cribrosa, on the other hand, may show marked changes.

A.E.F.

(445b) Günther's researches on the influence of sex on helminth infections in man lead to no definite conclusions. In children influence of sex is not significant. It is stated that *Ascaris*, *Enterobius*, *Trichuris*, *Taenia saginata*, *T. solium*, and hydatid are more frequent in adult females, while *Cysticercus cellulosae*, *Schistosoma haematobium* and *Necator americanus* are found more often in adult males. Factors which may affect sex incidence include varying exposure to risk of infection and differences in hormone regulation: the latter may have therapeutic import.

A.E.F.

#### 446—Zeitschrift für Pflanzenkrankheiten (Pflanzenpathologie) und Pflanzenschutz.

- a. GOFFART, H., 1942.—“Der Wiesennematode, *Pratylenchus pratensis* (de Man 1880) ein wenig bekannter Getreideschädling.” 52 (5), 261–269.

(446a) Goffart finds that the meadow nematode, *Pratylenchus pratensis*, may be quite a serious pest of cereals particularly of winter rye and winter barley, the roots of which become invaded, the cells of the cortex being extensively damaged. He gives a general account of the parasite and of the symptoms caused by it on affected cereals. It appears to be especially serious in north Germany on light soils poor in humus overlying gritty subsoils.

T.G.

#### 447—Zeitschrift für Veterinärkunde.

- a. POPPE, 1942.—“Sommerwunden-Behandlung.” 54 (6), 197–198.

(447a) Poppe describes a method of treating summer sores in horses with digitalis. A tampon was soaked in the contents of one ampoule of Digipuratum [the equivalent of 1.5 grains of active digitalis leaves], applied to the sore, and covered with a dressing. The latter was

changed once or twice at 24-hour intervals. All *Habronema* larvae were destroyed and the sore healed normally. It is emphasized that this treatment is only suitable for fresh sores.

A.E.F.

#### 448—Zentralblatt für Bakteriologie. Abteilung II.

- a. LÜBINSKY, G. A., 1942.—“Die zweiten Zwischenwirte des Katzenleberegels (*Opisthorchis felineus*) in der Umgebung Kiëws.” 105 (14, 16), 255-257.

(448a) By feeding rabbits and cats with 8 species of fishes from the Kiev district, Lübinsky has shown that *Tinca tinca*, *Leuciscus idus*, and (a new record) *Chondrostoma nasus* act as second intermediate hosts for *Opisthorchis felineus*. No infection was obtained when *Leuciscus leuciscus*, *Blicca bjoerkna*, *Abramis brama*, *A. sapa*, or *Rutilus rutilus* were fed. Infections of Dnieper fishes with *O. felineus* metacercariae are usually light.

A.E.F.

#### 449—Zoologicheskii Zhurnal.

- a. SKVORTSOV, A. A., 1942.—“Egg structure of *Taeniarhynchus saginatus* and its control.” 21 (1/2), 10-18. [In Russian: English summary pp. 17-18.]

(449a) The eggs of *Taenia saginata* have four membranes. The first is mucous and colourless, the second is composed of proteins of large molecular weight and dissolves in pepsin and trypsin. The third resembles the second chemically but is much thinner, while the fourth is transparent, semi-permeable and consists of lipoids. The onchosphere survives drying for a month. Different phenols which dissolve lipoids are the best lethal agents. A soap-lysol solution (crude phenol in green soap) is effective against *Taenia* eggs.

R.T.L.

#### 450—Zoologischer Anzeiger.

- a. GOFFART, H., 1942.—“*Anguina klebahnii* n.sp. (Tylenchidae), ein Nematode in Blüten von *Primula florindae* Ward.” 138, 174-179.

(450a) Goffart describes, under the name of *Anguina klebahnii* n.sp., a nematode parasite affecting the flowers of *Primula florindae* Ward. The females measure 0.8 to 1.14 mm. and the males 1.06 to 1.15 mm. in length (measurements which agree with those of *Anguillulina dipsaci* already known as a parasite of *Primula florindae*). [From an abstract in Z. PflKrankh., 53, 153.]

T.G.

#### 451—Zuckerrübenbau.

- a. GOFFART, H., 1942.—“Zur Frage des Ölfruchtanbaues auf Nematodenböden.” 24 (8), 89-92.

(451a) Goffart has conducted experiments to test the effect of growing oil-seed crops on land infested with the sugar-beet eelworm [*Heterodera schachtii*]. Such crops as rape (Winterraps, Sommerraps, Winterrüben and Sommerrüben) and mustard, though capable of acting as hosts of the parasite, do not carry such large numbers of cysts on their roots as sugar-beet, and probably support only one generation of the parasite per year. He concludes that as a wartime measure successive sugar-beet crops can be spaced 2 to 3 years apart with oil-seed crops intervening. Under normal conditions an interval of 4 years would be practised with the growing of inimical crops such as lucerne.

T.G.

#### 452—Züchtungskunde.

- a. HOGREVE, F., 1942.—“Schlachtbeobachtungen an Rindern und die Beschaffenheit des Rinderkörpers verschiedener Schlachtwertklassen. I. Alter und Gesundheits- bzw. Krankheitsverhältnisse des Versuchstiermaterials.” 17 (1), 9-26.

(452a) This is the first of a series of papers giving the results of the examination of cattle of various breeds at the slaughterhouses of 5 German cities (Dresden, Berlin, Cologne, Stuttgart and Munich) in 1941. It includes figures for liver-fluke infestation. Of a total of 448 cattle 13.1% were infested, while for Stuttgart alone the incidence was as high as 49.5%. Liver-fluke incidence is also analyzed according to age, sex, and breed of cattle.

A.E.F.



## NON-PERIODICAL LITERATURE

- 453—\*BRAUN, H., 1942.—“Parasitische Würmer als Krankheitsursachen.” Stuttgart, 128 pp.
- 454—\*BRAZIL. MINISTERIO DE AGRICULTURA, 1942.—“Conferencia nacional contra la hidatidosis.” Buenos Aires, 151 pp.
- 455—\*CARALPS, 1942.—“Los quistes hidatídicos del pulmón y de la pleura.” Madrid & Barcelona, 65 pp.
- 456—CROWELL, I. H. & LAVALLÉE, E., 1942.—“Check list of diseases of economic plants in Canada.” Dominion Department of Agriculture, Canada, 68 pp.

Crowell & Lavalée record the following nematodes as attacking plants of economic importance in Canada: *Heterodera marioni* on *Antirrhinum majus* L., *Cucumis sativa* L., *Lactuca sativa* L., *Lobelia* spp., *Lycopersicum esculentum* L., *Nicotiana* spp., *Paeonia* spp., *Solanum tuberosum* L.; *Heterodera schachtii* on *Avena sativa* L., *Beta vulgaris* L., *Triticum aestivum* L.; *Heterodera punctata* on *Triticum aestivum*; *Ditylenchus dipsaci* on *Iris* spp., *Narcissus* spp.; *Anguillulina pratensis* on *Narcissus* spp.; *Aphelenchoides ritzema-bosi* on *Chrysanthemum* spp.; *Aphelenchoides fragariae* on *Begonia* sp. and *Chrysanthemum* spp.; *Aphelenchus avenae* on *Triticum aestivum*. T.G.

- 457—CULBERTSON, J. T., 1942.—“Medical parasitology.” New York, xv + 285 pp.
- 458—\*FERNANDEZ, F., 1942.—“Parasitosis intestinales.” [Número 2 de los ‘Manuales de medicina práctica’.] Barcelona, 2nd edit., 136 pp.
- 459—\*GENEFF, C., 1942.—[‘Rossnitga’ (liver fluke disease) in sheep in Bulgaria.] Sofia, 19 pp. [In Bulgarian.]

Geneff has demonstrated that the sheep disease, known to farmers in Bulgaria as “Rossnitga” and common every year in marshy areas in late summer and autumn, is caused by *Fasciola hepatica* infection. The disease is very severe: from 5% to 50% of sheep die, and the remainder have to be slaughtered. [From an abstract in Jber. Vet. Med., 69, p. 584.] A.E.F.

- 460—KERR, K. B., 1942.—“Trichinosis problem in California. Report of a survey 1940-1941.” San Francisco, 37 pp.
- 461—\*LARGHERO YBARZ, P. et al., 1942.—“Quiste hidático del pulmón.” Montevideo, 67 pp.
- 462—NEW YORK STATE TRICHINOSIS COMMISSION, 1942.—“The meat you eat. Report of the New York State Trichinosis Commission.” New York, 141 pp.
- 463—\*VÉLEZ BOZA, F., 1942.—“Contribución al estudio de las reacciones cutáneas alérgicas en la Schistosomiasis mansoni.” Thesis, Caracas.
- 464—KEEPING LIVESTOCK HEALTHY. Yearbook of Agriculture, 1942. United States Department of Agriculture, Washington, D.C., 1942, xiii + 1276 pp.
- MOHLER, J. R., WIGHT, A. E., MacKELLER, W. M. & BISHOPP, F. C., 1942.—“Losses caused by animal diseases and parasites.” pp. 109-116.
  - SCHOENING, H. W., SCHWARTZ, B., HUFFMAN, W. T. & MADSEN, L. L., 1942.—“Causes of disease.” pp. 117-137.
  - EICHHORN, A., SARLES, M. P. & ELLIS, N. R., 1942.—“Protective mechanisms against disease.” pp. 138-154.
  - SCHWARTZ, B. & BISHOPP, F. C., 1942.—“Parasites and insects affecting livestock.” pp. 276-294.
  - STILES, G. W. & LUCKER, J. T., 1942.—“Bacterial infections and parasites common to man and animals.” pp. 295-312.
  - FOSTER, A. O., 1942.—“Internal parasites of horses and mules.” pp. 459-475.
  - PORTER, D. A., 1942.—“Tapeworm and roundworm parasites of cattle.” pp. 593-604.
  - SPINDLER, L. A., 1942.—“Internal parasites of swine.” pp. 745-786.
  - SCHWARTZ, B., 1942.—“Trichinosis.” pp. 787-802.
  - DIKMANS, G. & SHORB, D. A., 1942.—“Internal parasites of sheep and goats.” pp. 859-903.
  - WEHR, E. E. & CHRISTENSEN, J. F., 1942.—“Internal parasites of poultry.” pp. 1007-1040.
  - PRICE, E. W. & HARWOOD, P. D., 1942.—“Internal parasites of dogs and cats.” pp. 1150-1173.
  - SHILLINGER, J. E., 1942.—“Diseases of farm-raised game birds.” pp. 1226-1231.
  - SHILLINGER, J. E., 1942.—“Diseases of fur animals.” pp. 1232-1238.

(464a) In their discussion on the economic consequences of animal diseases in the United States the authors point out that the unthriftiness of farm stock resulting from parasitic infections means a particularly heavy loss to the farmer. This loss is very difficult to assess since it arises from extra expenditure on labour, food and drugs. A tabulated estimate of the annual loss resulting from the more important diseases shows internal parasites easily heading the list at 125 million dollars. D.O.M.

(464b) Among the various agents which are responsible for disease, the authors mention parasitic helminths and give, in outline, the ways in which worms are transmitted and cause injury to their hosts. D.O.M.

(464c) In the section dealing with immunity against parasites, the authors point out that the protective mechanisms are similar to those observed in bacterial and virus infections. Immunity plays an important part in reducing the effects of parasitism but does not give complete protection and it is advisable, therefore, to resort to treatment and to general prophylactic measures. D.O.M.

(464d) The diseases produced by the more important types of helminths and the general principles of control are dealt with in this general survey of the parasites of livestock. D.O.M.

(464e) The authors mention the more important parasites which are common to man and animals. D.O.M.

(464f) Among other parasites of equine hosts, the helminths are mentioned in this article together with notes on their pathogenicity, treatment and control. D.O.M.

(464g) This article deals with the life-cycle, prevention and treatment of the more important tapeworms and roundworms of cattle. D.O.M.

(464h) The author deals in considerable detail with the principal parasites found in the pig and discusses their life-cycle, pathogenicity and control by treatment and management. D.O.M.

(464i) Schwartz deals fully with the life-cycle of *Trichinella spiralis*, the disease it causes and its incidence and control in man and pig. He points out that recent surveys in the United States have shown a higher incidence than was formerly supposed and that human infection would be largely eliminated by the adoption of control measures against infection in pigs. D.O.M.

(464j) This paper contains an account of the life-history, pathogenicity, treatment and control of the helminth and protozoan parasites of sheep and goats. D.O.M.

(464k) In addition to the general account of the principal protozoa and helminths infecting poultry in the United States the paper contains a useful discussion on the control of these parasites, many of which are a serious menace to poultry breeders. D.O.M.

(464l) The authors give an account of the life-histories and pathogenicity of the principal protozoa and helminths of dogs and cats and include a discussion on methods of control and treatment. D.O.M.

(464m) In this brief account of the diseases of artificially reared game birds, the author includes some of the more important helminths causing losses among these hosts. D.O.M.

(464n) The author gives a brief account of the diseases of silver foxes and minks and mentions some of the more important helminths. D.O.M.



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## NOTE.

In all indexes the reference is to the serial numbers and not to the pages. Numbers in bold type indicate abstracts and numbers in Roman type refer to title-only entries.

In the Author Index there are no cross-references to show joint-authorship, but authors of joint papers are listed individually. Thus, a paper by "Brown, B., Jones, A. & Smith, J." would have three separate entries, "Brown, B." "Jones, A." and "Smith, J."

In the Index of Subjects, alphabetization is under the first word (e.g. "*Acer* sp." before "*Acerina* sp."). Under the generic name of a helminth the following order is observed: papers on the genus as such; papers on undefined species; papers on new and defined species, e.g.

*Capillaria*  
 — spp.  
 — *aerophila*  
 — *amarali* n.sp.

In cross-entries under names of hosts, the specific names of new species of helminths are omitted. *Anthelmintics* are listed under that word and also under the name of the parasite or disease.

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## CORRIGENDA

*Serial*  
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29a (Title) Line 1 For "survey" read "study"  
 121a (Abstract) Line 3 For "Dactolugyrus" read "Dactylogyrus"  
 263c (Title) Line 1 For "seriologically" read "serologically"

